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ACKNOWLEDGED

NEW YORK STATE PHYSICAL FITNESS STANDARDS

EVALUATIVE PROCEDURES IN PHYSICAL ACTIVITIES
FOR GIRLS AND YOUNG WOMEN



NEW YORK STATE WAR COUNCIL
OFFICE OF PHYSICAL FITNESS
STATE EDUCATION DEPARTMENT
DIVISION OF HEALTH AND PHYSICAL EDUCATION
Cooperating

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New York (state) Office of Physical Fitness

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DIAGRAM SHOWING SCOPE OF THE
PLAN FOR APPRAISING ACHIEVEMENT AND FOR CERTIFICATION

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FOREWORD

The need for definite standards in physical activity has been recognized for many years by leaders in physical education. Experience with the New York State Physical Fitness Training program during the past two years, and with the State Physical Education program during the past two decades provides pointed evidence of this need. The findings of Selective Service and Military and Naval Forces during World War II signal again the necessity for specific and graded standards of accomplishment in this field.

The New York State Physical Fitness Standards covering Evaluative Procedures in Physical Activities for Girls and Young Women represent a next step in providing uniform statewide means of measuring results. They are based on experience gained from the program developed in New York State. This Handbook is made available in printed form by the State War Council through its Office of Physical Fitness for all agencies to improve the physical fitness of the youth of the State *now and in the future*.

The Evaluative Procedures contained in this Handbook are intended to help strengthen the program now under way throughout the State. Pursuant to statute and Regulations, as approved by the Regents, these testing procedures have been declared by the Commissioner of Education to represent "acceptable examinations and tests" to be employed by school authorities in measuring progress in physical education and for use in periodic Physical Fitness Check Up.

The materials aim to serve three purposes: first, to evaluate local achievement on a uniform statewide basis; second, to stimulate the progressive efforts of girls and young women participating in the physical fitness program; and third, to stimulate the progressive efforts of teachers, directors and administrators responsible for this program and give due recognition to the attainments of each.

The standards represent tangible goals of accomplishment in accordance with the variable capacities and experiences of persons in a given class or group. To this end, provision is made for succeeding levels of achievement designated as MERIT, EXCELLENT and SUPERIOR. Each level of achievement is concisely defined by numerical description. Thus, persons with limited capacities and experiences in physical fitness activities find levels of achievement which stimulate them to optimum effort, and for which appropriate State Certificates and Awards are obtainable. In the same way, individuals with high capacities and rich experiences are encouraged to do their best to achieve a higher standard and award.

The evaluative procedures contained in this Handbook should stimulate community effort and lead to a greatly enriched program of physical education. Consideration has been given to a wide range of activities and flexibility of program for different types of communities.

HIRAM A. JONES

State Director of Physical Fitness

Albany, New York
State Education Building
September 1, 1944

ACKNOWLEDGMENTS

The State Committee on Activities for Girls and Women under the Chairmanship of Dr. Helen McKinstry in the early days of World War II and the leaders in the hundred or more communities who worked with the Committee were of invaluable assistance in pointing the way to improved methods and materials in physical education.

The untiring efforts of these and other leaders in cooperation with outstanding work by the staffs of the Office of Physical Fitness of the New York State War Council and the Division of Health and Physical Education of the State Education Department, together with the splendid support of the State War Council and the State Board of Regents, have been a great stimulus to improvement in this field.

The evaluative procedures presented in this handbook are the result of the efforts of the Sub-committee on Activities for Girls and Women of the State Technical Committee on Physical Fitness Standards, under the general chairmanship of Colonel Clifford L. Brownell, with the able assistance of members of the staffs. Special acknowledgment is made to the members of the Sub-committee on Activities for Girls and Women as follows: Dorothy Zirbes, New York City, Chairman, Dorothea Deitz, Farmingdale, Virginia Harvey, Troy, Grace Lecomte, Watervliet, Jay Marchiano, New York City, Marie Schuler, Kenmore, and Marion Stowell, Syracuse.

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Thanks are due to Mary Washington Ball of Cortland State Teachers College, Dr. Anne Schley Duggan, Texas State College for Women, and Mrs. Avery J. Pratt, President, State Congress of Parents and Teachers for review of materials, and to Claudia Moore, University of Colorado, Visiting Consultant, for her work on the dance materials. Permission of the authors and publishers to utilize materials previously published is gratefully acknowledged.

This project would not have been possible except for the constant stimulation and help given by the State War Council's Committee on Physical Fitness and the State Committee on Physical Fitness and Recreation of the American Legion, Department of New York.

Finally, the State is greatly indebted to Dr. Harold H. Schaff, Executive Secretary of the State War Council, for exceptional understanding of the fitness needs and the problems. His proficient management and dispatch in the conduct of affairs during this emergency, has been a great asset in completing this project.

H. A. J.

September 1, 1944

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NEW YORK STATE PHYSICAL FITNESS STANDARDS

Evaluative Procedures in Physical Activities for Girls and Young Women

Teachers of physical education, directors and instructors of fitness, have recognized the need for evaluative procedures by which outcomes of the program can be assessed. The handbook has been prepared in recognition of this need. The material in the handbook has been compiled by teachers in the field. Every effort has been made to simplify administrative procedures in giving and scoring the tests.

The physical activity program for girls and women has been divided into six areas: team sports, individual and dual sports, dance, self-testing, aquatics, and outing and camping. Within each area achievement type tests have been constructed for a considerable number of activities. No attempt has been made to provide a complete list of tests. The activities program outlined in the New York State Education Department Syllabus in Physical Education for secondary school girls and fitness materials of the State War Council have been used as a guide for determining what appraisal techniques should be established. In actual use, the choice of activities and their place in the program is left to the teacher. Perhaps no program will include all of the activities listed but all are used in the various sections of New York State.

In addition to the specific tests in the six areas listed, there has been developed also a "hub" or cross-section type of test called "Fundamentals of Motor Performance." This test is to be used to evaluate the broad fundamentals of the program—those factors which underlie or which are common to skill and to efficient use of the body in everyday activ-

ities, and which contribute to total fitness of the individual. Each element in this battery is scored on a 100 point scale. A perfect score on the total test is 1000.

To the teacher of physical education, the materials of this handbook will be of value in:

- a. Evaluating a girl's skill in physical activities
- b. Evaluating strengths and diagnosing weaknesses in pupil achievement in the broad fundamentals of the program for guidance purposes through use of the "Fundamentals of Motor Performance Test"
- c. Stimulating and maintaining interest in a broad all-round program through the certification plan for recognition of achievement on successively higher levels
- d. Classifying students for instructional purposes within a given class or group
- e. Marking or grading pupil progress in physical education.

To the individual girl or young woman who participates in the physical education program, the materials of this handbook will be of value in:

- a. Helping her to evaluate her own progress in learning physical education activities
- b. Helping her to understand her achievement in relation to the group of which she is a part
- c. Helping her to all-round achievement in physical activities through the winning of proficiency certificates.

The skill tests described for the activities included in the six areas are intended to *follow* a period of instruction in those seasonal activities which are taught during the course of the year. In the team sports area, for example, the tests are composed of objectively measured elements which make for skill in performance. These elements should be introduced to the pupils only as test items, and only when the period of instruction in the game itself has been completed. At no time should practice in the test take the place of the total learning and participation experience in an activity in the instructional program. In the case of activities other than those of the game type, the tests are of the "passed" or "failed" or check list type. Form as set forth in accepted professional source materials is the basis upon which performance is to be judged. The instructor is charged with the responsibility of requiring high standards.

In initiating the use of the Fundamentals of Motor Performance Test, it will be necessary to give this test early in the school year, and again at the close of the year. After the first time the test is administered to all pupils, only new entrants will need to be tested at the beginning of each school term or year. All pupils should be re-tested at the close of each school year. A comparison of the results of these tests over several years can be used to indicate the development of individuals in the broad fundamentals of the program as influenced by the natural growth process, health status, and learning opportunities in physical education activities. At present there are no age standards for this test. However, after data are gathered, and age score ranges determined, a more accurate evaluation of achievement in these fundamentals will be possible.

Every effort has been made to keep administrative procedures simple. Study of the tests and scoring scales will indicate that they follow a pattern which, it is believed, will make for ease of operation and clarity of meaning. Scor-

ing scales are provided for each test element in order that scores from several tests which comprise one battery may be combined into a total score. The total score can then be interpreted in terms of a scale score. The scale score is used to indicate whether or not a girl is eligible to receive a certificate. It may also be used in interpreting an individual's own score, as the scale scores 5, 4, 3, 2, and 1 can be considered as comparable to an A, B, C, D, and E rating.

The plan for certification also follows a pattern. A girl may attain Merit, Excellent or Superior certificates in any of the six activity areas. She may then progress to attain certification for all-round proficiency, again on three levels, namely All-Round Merit, All-Round Excellent, or All-Round Superior. The highest rating is that of Leader. A girl who obtains the Leader certificate must, in addition to showing a breadth of interest, have served in several capacities requiring acceptance of responsibility and demonstration of initiative and reliability. Details of the certification plan are listed in Table I.

It is recognized that there are factors in addition to physical activity which contribute to fitness. Among these are adequate diet, rest, treatment of remediable defects and attention to irregularities of development. It is also recognized that there are desired outcomes of physical education that go beyond the physical aspects of fitness, and that their realization depends not only upon the choice of activities but also upon the quality of the instructor's leadership. A good teacher uses the activities as tools through which desirable attitudes and appreciations can be developed. She will also use the activity situation as a laboratory for the observation and guidance of behavior. If total fitness is to be attained, consideration of these essentials must accompany the development of the fundamentals of motor performance and the translation of these into specific skills.

PLAN FOR GRANTING CERTIFICATES¹

1. **Area Certificates** may be won in:
 - a. Team sports
 - b. Individual and dual sports
 - c. Dance
 - d. Self testing activities
 - e. Aquatics
 - f. Outing and camping
2. **Area Certificates** are awarded when a girl has:
 - a. Attained a test score of 300 on the Fundamentals of Motor Performance Test
 - b. Attended at least 75% of the laboratory sessions of an activity within the area for which she claims a certificate
 - c. Attained a scale score on skills tests as follows:
Merit—Rating of 3 (see Table I) on one activity
Excellent—Rating of 4 (see Table I) on two activities
Superior—Rating of 5 (see Table I) on three activities.
3. **All-Round Certificates**
 - a. All-Round Merit—Hold a Merit Certificate in four areas.
 - b. All-Round Excellent—Hold an All-Round Merit Certificate with an

excellent certificate in two areas (i.e., at least two merit and two excellent).

- c. All-Round Superior—Hold an All-Round Merit Certificate with a Superior Certificate in two areas (i.e., at least two merit and two superior).

4. **Leader's Certificate**

- a. Hold any All-Round Certificate
- b. Show ability to referee or umpire at least two team and two individual or dual sports, and pass an information test comparable to the Junior National Officials' Rating².
- c. Serve as a manager or leader of an activity in any two areas, and serve as an assistant to the instructor in a physical education class.
- d. Receive specific instruction in the principles and techniques of leadership.
- e. Receive three endorsements as to qualities of leadership, character, cooperation and responsibility from (a) the physical education teacher, (b) one of the following: principal, dean, counsellor, grade or room adviser, and (c) one other teacher.

¹To obtain report forms and certificates send your request to the State office in Albany.

²Information regarding these tests can be obtained from the National Officials Rating Commission of the National Section on Women's Athletics, A.A.H.P.E. and R., 1201 Sixteenth St., N.W., Washington, D. C.

TABLE 1: FOR INTERPRETING TEST SCORES
FOR CERTIFICATION AND INTERPRETING INDIVIDUAL SCORES*

Area	Certificate Rating	Superior 5	Excellent 4	Merit 3	2	1
1. Team Sports						
Basketball		17-20	13-16	7-12	4-6	1-3
Field Hockey		17-20	13-16	7-12	4-6	1-3
Soccer		17-20	13-16	7-12	4-6	1-3
Softball		17-20	13-16	7-12	4-6	1-3
Speedball		17-20	13-16	7-12	4-6	1-3
Volleyball		17-20	13-16	7-12	4-6	1-3
2. Individual and Dual Sports						
Archery		5	4	3	2	1
Badminton		17-20	13-16	7-12	4-6	1-3
Bicycling		17-20	13-16	7-12	4-6	1-3
Bowling		5	4	3	2	1
Croquet		5	4	3	2	1
Deck Tennis		13-15	10-12	5-9	3-4	1-2
Fencing		17-20	13-16	7-12	4-6	1-3
Golf		21-25	16-20	9-15	4-8	1-3
Handball		17-20	13-16	7-12	4-6	1-3
Horseshoes		9-10	7-8	5-6	3-4	1-2
Horseback Riding		17-20	13-16	7-12	4-6	1-3
Ice Skating		17-20	13-16	7-12	4-6	1-3
Paddle Tennis		13-15	10-12	5-9	3-4	1-2
Roller Skating		17-20	13-16	7-12	4-6	1-3
Shuffleboard		9-10	7-8	5-6	3-4	1-2
Skiing		17-20	13-16	7-12	4-6	1-3
Snowshoeing		5	4	3	2	1
Table Tennis		13-15	10-12	5-9	3-4	1-2
Tennis		13-15	10-12	5-9	3-4	1-2
Tobogganing		5	4	3	2	1
3. Dance						
Folk		17-20	13-16	7-12	4-6	1-3
Modern		17-20	13-16	7-12	4-6	1-3
Social		17-20	13-16	7-12	4-6	1-3
Tap		17-20	13-16	7-12	4-6	1-3
4. Aquatics						
Swimming—self safety		6	6	8	-	-
Strokes		3	3	3	-	-
Rescue		4	4	2	-	-
Boating		17-20	13-16	7-12	4-6	1-3
Canoeing		17-20	13-16	7-12	4-6	1-3
5. Self Testing Activities						
Stunts		17-20	13-16	7-12	4-6	1-3
Tumbling		17-20	13-16	7-12	4-6	1-3
Apparatus—Horse		17-20	13-16	7-12	4-6	1-3
Parallel Bars		17-20	13-16	7-12	4-6	1-3
Stall Bars		17-20	13-16	7-12	4-6	1-3
Emergency Skills		17-20	13-16	7-12	4-6	1-3
6. Outing and Camping		Sections	Sections	Sections		
(Prerequisite 1, 2, 3, and 5(a))		5 (g and h)	5 (f), 6 & 7	4, 5 (b, c, d & e)		

*The following example from Field Hockey shows the way in which Table I is used. See introduction to the team sports area to find out how the total scale score in a specific activity is computed. Suppose the individual has attained a total scale score in Field Hockey of 15. Follow the line labelled Field Hockey across to the column showing score values. In column two, scores extend from 13 to 16. The score of 15, therefore, is in this column. Follow it to the top of the column to determine the rating and certificate level. In this instance, the rating is "4", the certificate "Excellent".

THE ADMINISTRATION OF TESTS

In order to make efficient use of available time and to assure objectivity and accuracy in giving and scoring the tests, it is important to make careful preparation for their administration. If this is not done the teacher may very likely find that she has gotten results quite different from those she should have gotten or expected to get. This would be unfortunate, both from the standpoint of the teacher who uses the test and the girls who are affected by the results of taking the test. Important suggestions for the administration of the tests follow:

1. Master the directions for giving and scoring the test. Be so explicit that nothing is left to the imagination. Careful preparation precludes the possibility of misinterpretation of directions with consequent loss of objectivity or questioning of procedure with consequent loss of pupil time.
2. Make sure that equipment to be used is in good condition and in place before the group to be tested is ready to go to work.
3. Make sure that all necessary floor or field markings are ready before the class assembles to go to work.
4. Make a diagram of the floor or field showing the exact place where each part of the test is to be given and how pupils are to move from station to station.
5. Train reliable pupil leaders as assistants in giving and scoring the tests.
6. Study the test items with a view to organizing administration of the battery in the shortest possible time. Where the description of one test item is such as would seem to indicate that it will take more time to do than the other items in the battery, arrange to have more than one group working on the more time-consuming item. For example, in the softball test, it is recommended that several groups work on the batting test, whereas one group working on each of the other items is sufficient. On the batting test, it will be helpful if the pitcher has several balls to use.
7. Arrange score sheets so that all test items can be recorded on one sheet. If the box in which scores are recorded is divided diagonally in half, the raw score can be recorded in the upper compartment at the time the record is made, and then, at a later time, scale scores can be recorded in the lower compartment and these totaled to give the composite score.



FUNDAMENTALS OF MOTOR PERFORMANCE

Secondary School Girls

SCORING AND SCALING TEST SCORES

- I. There are 10 items in the battery, each of which is scored on a 100 point scale.
- II. All items in the battery are to be given to each girl.
- III. Score is the total number of points (scale scores) scored on the 10 items. Perfect score=1000.
- IV. When a student has taken one of the test items, record the score (this is called the raw score). This must be done at the time the test is given. Refer to the scoring table (see pp. 15-18) to find the scale score, and record it. This need not be done at the time the test is given. You will find the scale score by referring to the scoring table, locating the raw score (the one made by the player on the test) and then reading the scale score directly opposite it on the "scale-score" column. As for example: Raw Score of 100 on the kick—"Punt for Distance," the appropriate scale score located in column 1 is 85.
- V. Take all scores to the nearest whole number (except Jump and Reach which is scored to the nearest half inch). Scores over the half are scored to the nearest whole number. Scores which are half way or less than half way between two whole numbers are scored to the lower whole number.

THE TEST ITEMS:

1. Get Up and Run

- a. *Set-up of equipment.* Draw two parallel lines on the gymnasium floor, 50 feet apart. Stop watch.
- b. *Description of the test.* Student lies down on the floor *within the running area*, head toward the finish line, feet over the starting line. On signal she turns, gets to her feet, and runs over the finish line 50 feet away.
- c. *Score.* Seconds of time from signal to time student crosses the finish line.

2. Soccer Throw for Distance¹

- a. *Set-up of equipment.* Well inflated soccer ball. 100 ft. measuring tape. "Throwing line"—2 inches wide, 10 feet long.
- b. *Description of the test.* Student stands with the ball in hand, behind the throwing line. With or without a run, she throws the ball

as far as she can throw it. Measure from the inner edge of the "throwing line" at the place where the player stood as she threw the ball to the point where it first touched the ground. Three trials are allowed, and the best throw recorded. Disqualify a throw if the student goes over the line in making it.

- c. *Score.* Number of feet the ball is thrown on the best of three tries.

3. Jump and Reach²

- a. *Set-up of equipment.* Piece of chalk. Clear, smooth wall space. Measuring stick.
- b. *Description of the test.* The student holds a piece of chalk between her fingers and reaching up as far as possible (keeping heels flat on the floor and arm and body in contact with the wall) makes a short

¹McCloy, C. H., *Measurement of Motor Ability*. Mimeographed notes.

²McCloy, C. H. *Tests and Measurements in Health and Physical Education*, p. 64. Used with permission. Published by F. S. Crofts Co., New York City.

horizontal mark on the wall. She then jumps upward as far as possible and makes a mark on the wall as nearly at the peak of her jump as possible. Student jumps to attain her greatest possible height (probably needs about five trials).

- c. *Score.* Distance between mark made after *reaching* as high as possible, and highest point *jumped*. Measured in half inches. Score to the nearest half inch. Score is the number of inches and half inches jumped.

4. Soccer Punt for Distance

- a. *Set-up of equipment.* Well inflated soccer ball. 100 foot measuring tape. "Kicking line" — 2 inches wide, 10 feet long.
- b. *Description of the test.* Student stands with the ball in hand behind the kicking line and with or without preliminary steps, she punts the ball as far as she can punt it. Three trials are allowed, and the best of the three recorded. Measure from the inner edge of the "kicking line" at the place where the student stood as she punted the ball to the point where it first touched the ground. Disqualify a punt if the student goes over the line in making it.
- c. *Score.* Number of feet the ball is punted on the best of three tries.

5. Striking

- a. *Set-up of equipment.* Tennis ball in good condition, wall or other surface from which the ball will rebound so that it can be struck again. Two lines on the floor parallel to the wall being used as a backboard, the first 8 feet from the wall and the second 12 feet from it. Draw a line on the wall three feet from the floor and parallel to it. Stop watch.
- b. *Description of the test.* The stu-

dent stands, ball in hand, on the 12 foot line. On signal, she drops the ball on the line, and strikes it on the rebound in such manner that it hits the wall above the three foot line. She continues striking the ball as it rebounds, for a period of 30 seconds, moving about at will. To score, ball on rebound from wall must not strike floor nearer than the 8 foot line or be hit by the player when nearer the wall than the 8 foot line. Disregard the 12 foot line after the ball has been put in play.

- c. *Score.* Number of times the ball is hit against the wall during the 30" period of time, from points not nearer the wall than the 8 foot line, and which strike the wall above the three foot line. Balls struck when the player or the ball are nearer to the wall than the 8 foot line or which do not hit the wall above the 3-foot line do not count on the score. If the ball is missed, recover it and restart the ball from the 12 foot line, continuing the count. Penalty is in loss of time. Do not count any strikes made from without the 8 foot line marked on the floor or which do not go above three foot line on the wall.

6. Squat Thrust^a

- a. *Set-up of equipment.* Stop watch.
- b. *Description of the test.* On signal, student, starting from a standing position,
- (1) takes a deep knee bend and places her hands on the floor in front of her feet in a squat-rest position,
 - (2) jumps and extends her legs backward to a front leaning rest position,
 - (3) returns to squat rest position,
 - (4) stands erect.

^aU. S. Office of Education. Physical Performance Levels for High School Girls. "Education for Victory." October 1943. Used with permission.

Repeat as many times as possible in the time allowed. The back must not sway or hollow in the front leaning rest position, nor should the hips be raised above the line of the back. Emphasize four distinct counts for each movement.

- c. *Score.* Number of complete exercises plus extra quarter movements made in 30 seconds. After a complete exercise, if the individual then gets to squat when time is called, add $\frac{1}{4}$, if back to the front leaning rest position, add $\frac{1}{2}$, and if after the front leaning rest position, is back to squat, add $\frac{3}{4}$.

7. Push-Ups⁴

- a. *Set-up of equipment.* None
- b. *Description of the test.* Student lies face down on the floor with body straight and legs together. She bends her knees to a right angle and places her hands on the floor at shoulder level. She pushes up to a position in which the arms are straight and the weight is supported entirely on the hands and knees. Her body must be in a straight line from head to knees; she must not bend her hips or round or hollow her back. Next she bends her arms until her chest touches the floor. Legs or waist should not be permitted to touch. The weight continues to be supported by the arms and knees. *The entire exercise is repeated as many times as possible.*
- c. *Score.* Number of times the exercise is done.

8. Sustained Pull⁵

- a. *Set-up of equipment.* A bar from which the student can pull up to a full bent arm hang. Stop watch.
- b. *Description of the test.* Using an "ordinary grasp" come to a bent arm hang by standing on a stool. Remove the stool. Hold the position as long as possible, and time

until the student has come down to a straight arm hang.

- c. *Score.* Number of seconds of time the position is held.

9. Sit-Up⁶

- a. *Set-up of equipment.* None
- b. *Description of the test.* The student lies on her back with her feet separated two to two and a half feet and her legs straight. She places her hands on the back of her neck with finger tips touching and rests her elbows on the floor. A partner places her hands on her ankles and holds her heels in contact with the floor during the exercise. The subject sits up to vertical position, turns her trunk to left, touches her right elbow to her left knee and returns to the starting position. The finger tips of both hands must remain in contact behind the neck throughout the exercise but the back may be rounded and the head and elbows brought forward in sitting up and in touching the knee. Both knees must be on the floor. She then repeats the exercise, as many times as possible, alternating sides.
- c. *Score.* The number of times the student raises herself from a lying to a sitting position.

10. Balance

- a. *Set-up of equipment.* Stop watch. Draw five 10 inch lines, placed one directly in front of and parallel to the other, three feet apart.
- b. *Description of the test.* Student stands on the first of five marks, facing the other four. On signal, she takes two leaps (following her own preference on use of the feet) touching in succession each of the other four marks. Be sure to take these four leaps at running speed, and with no pause between leaps. As she comes down on the last mark, she makes a half turn in the

⁴Ibid.

⁵By permission of Marie Schuler, Kenmore, N. Y.

⁶U. S. Office of Education. *Op. cit.*

air, finishing on the toes of the foot she comes down on, and holds her balance (on her toes) for as long as possible. She must not move about on her toes to keep her balance.

c. *Score.* Time in seconds from the beginning of the first leap to the moment she loses her balance, or moves about on her toes to keep her balance. One practice trial may be allowed.

Scoring Scale for Fundamentals of Motor Performance

SCALE SCORE	GET UP & RUN	JUMP AND REACH ²	SOCCER THROW FOR DISTANCE	SOCCER PUNT FOR DISTANCE ⁷	STRIKING	PUSH UP ⁸	SUSTAINED PULL	SIT UP ⁸	30" SQUAT THRUST ⁸	BALANCE	SCALE SCORE
	SCORED IN SECONDS	SCORED IN INCHES	SCORED IN FEET	SCORED IN FEET	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	
100	3.0		170	116	45	60	75.0	61		10.0	100
99			169	115		59	74.2	60	22 $\frac{3}{4}$	9.9	99
98	3.1	21	167	114			73.6				98
97	3.2		166	113	44	58	72.8	59	22 $\frac{1}{2}$	9.8	97
96	3.3		163	112			72.0	58	22 $\frac{1}{4}$	9.7	96
95			162	110	43	57	71.4	57	22		95
94	3.4	20 $\frac{1}{2}$	161	109		56	70.6	56		9.6	94
93	3.5		160	108			69.8		21 $\frac{3}{4}$	9.5	93
92			158	107	42	55	69.2	55	21 $\frac{1}{2}$		92
91	3.6	20	156	106	41	54	68.4	54		9.4	91
90	3.7		155	105			67.6	53	21 $\frac{1}{4}$	9.3	90
89			154	104	40	53	67.0	52	21	9.2	89
88	3.8	19 $\frac{1}{2}$	152	103			66.2				88
87	3.9		151	102		52	65.4	51	20 $\frac{3}{4}$	9.1	87
86	4.0		149	101	39	51	64.8	50	20 $\frac{1}{2}$	9.0	86
85			147	100	38		64.0	49			85
84	4.1	19	146	99		50	63.2		20 $\frac{1}{4}$	8.9	84
83	4.2		144	98			62.6	48	20	8.8	83
82			143	97	37	49	61.8	47			82
81	4.3	18 $\frac{1}{2}$	141	96		48	61.0	46	19 $\frac{3}{4}$	8.7	81
80	4.4		140	95			60.4	45	19 $\frac{1}{2}$	8.6	80
79			139	94	36	47	59.6			8.5	79
78	4.5	18	137	93	35		58.8	44	19 $\frac{1}{4}$		78
77	4.6		135	92		46	58.0	43	19	8.4	77
76			134	91		45	57.4	42		8.3	76

Scoring Scale for Fundamentals of Motor Performance (Cont.)

SCALE SCORE	GET UP & RUN	JUMP AND REACH ²	SOCCER THROW FOR DISTANCE	SOCCER PUNT FOR DISTANCE ⁷	STRIKING	PUSH UP ⁸	SUSTAINED PULL	SIT UP ⁸	30" SQUAT THRUST ⁸	BALANCE	SCALE SCORE
	SCORED IN SECONDS	SCORED IN INCHES	SCORED IN FEET	SCORED IN FEET	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	
75	4.7		133	90	34		56.6	41	18 ³ / ₄		75
74	4.8	17 ¹ / ₂	131	89		44	55.8		18 ¹ / ₂	8.2	74
73			130	88	33		55.0	40		8.1	73
72	4.9		128	87		43	54.4	39	18 ¹ / ₄		72
71	5.0	17	126	86	32	42	53.6	38	18	8.0	71
70	5.1		125	85			52.8	37		7.9	70
69			124	84	31	41	52.0		17 ³ / ₄	7.8	69
68	5.2	16 ¹ / ₂	122	83			51.4	36	17 ¹ / ₂		68
67	5.3		120	82		40	50.6	35	17 ¹ / ₄	7.7	67
66			119	81	30	39	49.8	34		7.6	66
65	5.4		118	80			49.0		17		65
64	5.5	16	116	79	29	38	48.4	33	16 ³ / ₄	7.5	64
63	5.6		115	78			47.6	32		7.4	63
62			113	77	28	37	46.8	31	16 ¹ / ₂		62
61	5.7	15 ¹ / ₂	112	75		36	46.2	30	16 ¹ / ₄	7.3	61
60	5.8		110	74	27		45.4			7.2	60
59			109	73		35	44.6	29	16		59
58	5.9	15	107	72	26		44.0	28	15 ³ / ₄	7.1	58
57	6.0		106	71		34	43.2	27		7.0	57
56			104	70			42.4	26	15 ¹ / ₂		56
55	6.1		103	69	25	33	41.8		15 ¹ / ₄	6.9	55
54	6.2	14 ¹ / ₂	101	68		32	41.0	25	15	6.8	54
53			100	67	24		40.2	24	14 ³ / ₄	6.7	53
52	6.3		98	66		31	39.6	23			52
51	6.4	14	96	65	23	30	38.8	22		6.6	51

Scoring Scale for Fundamentals of Motor Performance (Cont.)

SCALE SCORE	GET UP & RUN	JUMP AND REACH ²	SOCCER THROW FOR DISTANCE	SOCCER PUNT FOR DISTANCE ⁷	STRIKING	PUSH UP ⁸	SUSTAINED PULL	SIT UP ⁸	30" SQUAT THRUST ⁸	BALANCE	SCALE SCORE
	SCORED IN SECONDS	SCORED IN INCHES	SCORED IN FEET	SCORED IN FEET	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	
50	6.5		95	64			38.0		14½	6.5	50
49			94	63		29	37.2	21	14¼		49
48	6.6	13½	92	62	22		36.6	20		6.4	48
47	6.7		91	61		28	35.8	19	14	6.3	47
46			89	60	21		35.0	18	13¾		46
45	6.8		88	59		27	34.2			6.2	45
44	6.9	13	87	58	20	26	33.6	17	13½	6.1	44
43	7.0		85	57			32.8	16	13¼		43
42			83	56		25	32.0	15	13	6.0	42
41	7.1	12½	82	55	19		31.2			5.9	41
40	7.2		80	54	18	24	30.6	14	12¾	5.8	40
39			79	53		23	29.6	13	12½		39
38	7.3	12	77	52			28.8	12		5.7	38
37	7.4		76	51	17	22	28.0	11	12¼	5.6	37
36			74	50		21	27.4		12		36
35	7.5		72	49	16		26.6	10		5.5	35
34	7.6	11½	71	48		20	25.8	9	11¾	5.4	34
33	7.7		70	47	15		25.0	8	11½	5.3	33
32			68	46		19	24.4	7			32
31	7.8	11	66	45	14		23.6		11¼	5.2	31
30	7.9		65	44		18	22.8	6	11	5.1	30
29			64	43	13	17	22.0	5			29
28	8.0	10½	62	42			21.4	4	10¾	5.0	28
27	8.1		61	40	12	16	20.6	3	10½	4.9	27
26	8.2		59	39			19.8			4.8	26

Scoring Scale for Fundamentals of Motor Performance (Cont.)

SCALE SCORE	GET UP & RUN	JUMP AND REACH ²	SOCCER THROW FOR DISTANCE	SOCCER PUNT FOR DISTANCE ⁷	STRIKING	PUSH UP ⁸	SUSTAINED PULL	SIT UP ⁸	30" SQUAT THRUST ⁸	BALANCE	SCALE SCORE
	SCORED IN SECONDS	SCORED IN INCHES	SCORED IN FEET	SCORED IN FEET	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	SCORED IN NUMBER OF TIMES	SCORED IN NUMBER OF TIMES	SCORED IN SECONDS	
25	8.3		58	38		15	19.0	2	10¼		25
24	8.4	10	56	37	11	14	18.2	1	10	4.7	24
23			55	36			17.4				23
22			53	35	10	13	16.8		9¾	4.6	22
21	8.5	9½	52	34			16.0		9½	4.5	21
20	8.6		50	33	9	12	15.2				20
19			49	32		11	14.4		9¼	4.4	19
18	8.7	9	47	31			13.8		9	4.3	18
17	8.8		46	30	8	10	13.0		8¾	4.2	17
16			44	29			12.2				16
15	8.9		43	28	7	9	11.4		8½	4.1	15
14	9.0	8½	41	27		8	10.6		8¼	4.0	14
13			40	26	6		10.0				13
12	9.1		38	25		7	9.2		8	3.9	12
11	9.2	8	37	24	5		8.4		7¾	3.8	11
10	9.3		35	23		6	7.6				10
9			34	22	4	5	7.0		7½	3.7	9
8	9.4	7½	32	21			6.2		7¼	3.6	8
7	9.5		31	20	3	4	5.4			3.5	7
6			29	19			4.6		7		6
5	9.6	7	28	18		3	3.8		6¾	3.4	5
4	9.7		26	17	2		3.2			3.3	4
3			25	16		2	2.4		6½		3
2	9.8		23	15	1		1.6		6¼	3.2	2
1	9.9	6½	21	14		1	1.0		6	3.1	1

(2) McCloy, C. H., *Op Cit.*

(7) Cozens, F. W.; Cubberly, H. J. & Neilson, N. P. *Achievement Scales for High School & College Women*. p. 68. Published by A. S. Barnes & Co. Used with permission.

(8) U. S. Office of Education. *Education for Victory*. October, 1943. Used with permission.

TEAM SPORTS AREA

Each battery of tests in this area contains four items. Total possible scale score on each battery is 20. Separate scoring scales are available for each test element, and care must be taken to use the proper scoring scale for each item in each sport.

The following example of the way in which the total (or composite) score for each test battery is computed is applicable to each sport in this area. The Field Hockey skills test is used here as an example.

The score on the test is the sum of the scale scores on the individual items of the battery. An example follows of the

way in which the score is computed. Suppose that in Test 1, the individual makes a test (raw) score of 25 seconds, which means a scale score of 3; on Test 2 a test (raw) score of 18 which means a scale score of 5; on Test 3 a test (raw) score of 15 which means a scale score of 4; and on Test 4 a test (raw) score of 8 which means a scale score of 3. Add the *scale scores* for each of the four tests—3, 5, 4, 3, which makes a total of 15. This is the individual's score on the field hockey test.

To determine the meaning of the score in relation to certification, or to determine the meaning of one's own score refer to Table I. (Page 9.)

BASKETBALL

1. Speed Pass

a. *Set-up of equipment.* Well inflated basketball, wall space. Line drawn on floor, 8 feet from and parallel to the wall. Stop watch.

b. *Description of the test.* Player stands behind the 8 foot line. At the signal "go" player passes ball against wall as rapidly as possible continuing until the signal "stop" is given at end of 30 seconds. If ball is out of control it must be recovered by player and brought back to starting line. Penalty is in loss of time. Two trials are permitted, recording the better score.

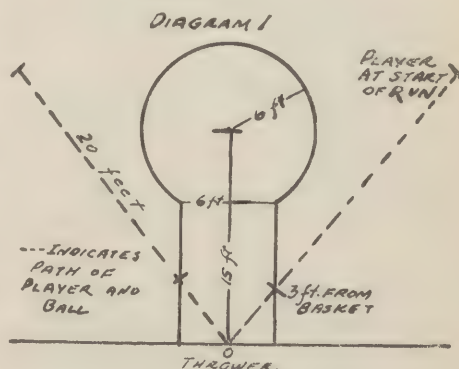
c. *Score.* Number of successful catches within the 30 second time period.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
30-34	5
23-29	4
14-22	3
7-13	2
2-6	1

2. Shooting

a. *Set-up of equipment.* Basketball goal. Well inflated basketball. Position of the "thrower" and person being tested as indicated in Diagram 1.



b. *Description of the test.* Player receives ball, on the run, from leader who is stationed under the basket. Player shoots for goal. Ten trials are required, five from the right side of the basket and

five from the left. Player starts running from a distance of 20 feet, receiving the ball approximately 3 feet from the basket.

- c. *Score.* Two points for each goal. One point if ball touches rim.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Foul Shooting and Retrieving

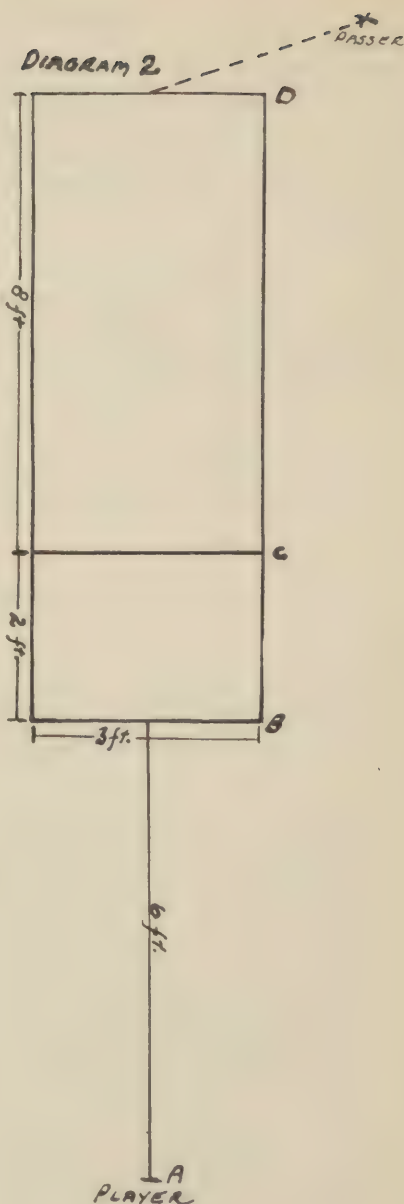
- a. *Set-up of equipment.* Well inflated basketball. Regulation basket. Officially marked court.
- b. *Description of the test.* Player takes position on or behind the foul line and shoots for basket, retrieves ball and shoots from spot of retrieval with or without a bounce. Five trials are allowed (gives a total of 10 shots). All basketball rules must be observed, e.g., not walking with ball, releasing ball within 10 seconds after assuming position on the foul line, 3 seconds after retrieving ball.
- c. *Score.* Two points for each goal. One point if the ball hits the rim of the basket.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

4. Pivot and Bounce

- a. *Set-up of equipment.* A well inflated ball. Outline a rectangle on the floor 3 x 10 feet. Draw a line across this rectangle two feet from the end, so that a second rectangle 3 x 8 is within the first. (See Diagram 2.) Six feet from the end of the rectangle and centered with it, place a mark for the player who is to take the test.



- b. *Description of the test.* A player starting at A (see diagram) running in to meet the ball receives a short accurate pass at designated point (D). Upon receiving ball, player executes a rear pivot with a bounce. At the completion of

the bounce the player's forward foot must at least be over the end line C, but striving for greater distance and crossing end line B. Ten trials are required.

Fouls. 1. Stepping over side lines of specified area. 2. Violation of the official basketball rules covering the pivot and the bounce.

Penalty. Disqualification in that trial.

- c. *Score.* If successful in crossing line B — 2 points. Crossing line C — 1 point.

Adaptation for Grades VII and VIII

Test 1—Laboratory participation in a game of basketball type, such as Six Passes and Shoot is acceptable.

Test 2—Bounce the ball and shoot from a position out from the basket.

Test 3—Use as described above.

Test 4—Eliminate the pivot. Player starts at A, receives the ball at D, and using one bounce crosses C, or if possible B. Score as indicated for test 4 above.

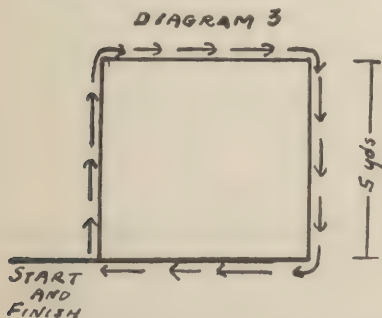
Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

FIELD HOCKEY

1. Dribble

- a. *Set-up of equipment.* Lay out a 5-yard square, the corners of which are marked by chairs or jump standards. Start and finish lines are identical. Regulation hockey stick, and ball, stop watch. (See Diagram 3.)



the square going in clockwise direction. Time is taken from the signal "go" until the player crosses the finish line. Two trials may be allowed, the better time being recorded. Disqualification: any violation of regulation hockey rules—e.g. kicking ball, using the wrong side of the stick, etc.

- c. *Score.* Time in seconds and fractions of seconds used to dribble the ball twice around the square.

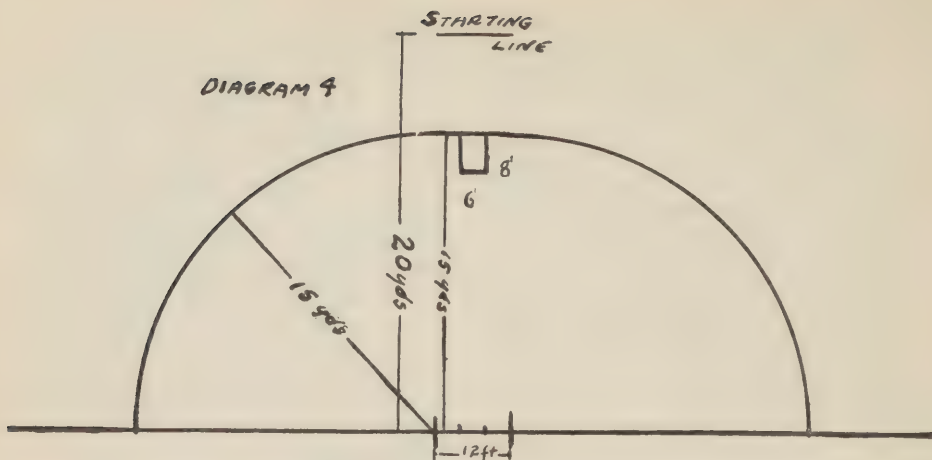
Scoring Table

Raw Score	Scale Score
10-15	5
16-23	4
24-35	3
36-43	2
44-53	1

- b. *Description of the test.* Ball is placed on the starting line, player starts behind the line. On signal she dribbles the ball twice around

2. Dribble and Drive for Goal

- a. *Set-up of equipment.* Hockey stick and 15 balls; marked regulation hockey field; area between



the goals divided into three equal parts, and marked by stakes pushed into the ground, or marked lines, etc. Rectangle 6 x 8 feet marked at the inside edge of the striking circle. Line 5 yards long marked parallel to and 20 yards from the goal line. (See Diagram 4.)

b. *Description of the test.* Balls are placed along the "starting line." From the starting line the player dribbles the ball to the striking circle and, within the 6 x 8 feet rectangle (see Diagram 4) shoots for goal. If the ball fails to reach the goal line the player must follow the ball and hit it into the goal. A ball which crosses the end line but does not go through the goal does not score and penalty is loss of score. As each goal is made (or lost across the goal line through inaccurate shooting) the player returns for another ball. No points are scored for balls hit after the player leaves the rectangle. One minute of time is allowed within which to complete as many drives for goal as her speed and accuracy will allow.

c. *Score.* Two points are scored for each ball passing through the area adjacent to either goal post, and

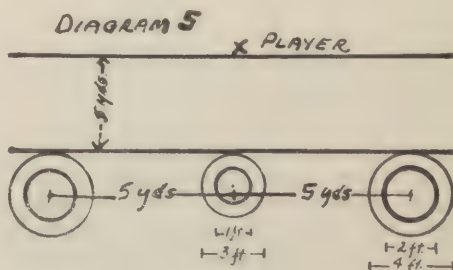
one point for each ball hit through the center area.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Roll In

a. *Set-up of equipment.* Hockey stick and ball. Marked 5 yard alley. Draw two circles four feet in diameter, the edges of which touch the alley and the centers of which are ten yards apart. Within each of these circles draw a second, two feet in diameter. (See Diagram 5.) Midway between these two circles draw a circle three feet in diameter and a second, one foot in



diameter, inside the first. Mark the player's position opposite the center circle and behind the side line.

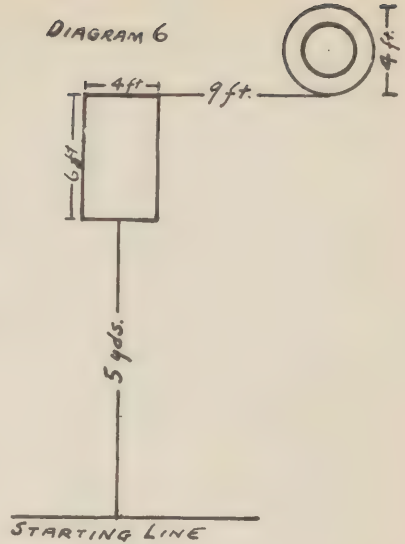
- b. *Description of the test.* Player takes the roll in position, following regulation hockey rules. Ten trials are allowed to roll the ball in to one of the circles. First trial is taken rolling the ball to the circle on the left, second to the center circle, and so on, rolling to each one in succession. Choice of circle for last trial is optional.
- c. *Score.* Player scores two points if the ball passes through the center circle, and one point if it goes through the outer target.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

4. Dribble and Pass for Accuracy

- a. *Set-up of equipment.* Hockey stick and ball. Five yards from a starting line, draw a rectangle 4 x 6 feet (see Diagram 6). Nine feet from the right far edge of the rectangle draw a circle 4 feet in diameter, the diameter of which coincides with the end of the 9 foot line. A second circle two feet in diameter is drawn inside the first one. (See Diagram 6.)
- b. *Description of the test.* Player taking the test stands at the start-



ing line, and on signal dribbles the ball through the rectangle from which she push passes to the marked circle. Ball must pass through the marked circle in order to score. Ten trials are allowed. All hockey rules must be observed.

- c. *Score.* Score two points if the ball passes through the inner circle, and one point if the ball passes through the outer circle.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

SOFTBALL⁹

1. Softball Throw for Accuracy

- a. *Set-up of equipment.* Use a solid wall for a target. Draw a rectangle 18 x 36 inches, the lower edge of which is 18 inches from

the floor. Around the first rectangle draw another 30 x 48 inches. This second rectangle will be 6 inches from each side of the first. 12 inch softball. Pitching line (plate) 35 feet from the target.

- b. *Description of the test.* Regula-

⁹Rodgers, E. G. & Heath, M. L. "An Experiment in the Use of Knowledge and Skill Tests in Playground Baseball." *Research Quarterly*, 2:113-131 (Dec. 1931) Used with permission.

tion Softball pitching rules govern the technique of the throw and position of the thrower on the plate. Player taking the test is allowed 10 trials to hit the target, using the regulation underhand throw.

- c. *Score.* Score two points for each throw which hits within the inner rectangle. Score one point for each throw which hits the line of the inner rectangle, or within the outer rectangle. A throw which hits the line of the outer rectangle scores zero.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

2. Batting

- a. *Set-up of equipment.* Regulation Softball diamond, 12 inch softball, bat. Diamond divided by a line which runs from home to second and out into the field; and line from first to third. (See Diagram 7.)



- b. *Description of the test.* Player stands in the batter's box and is given 10 trials to hit a legally pitched ball (according to regulation rules). Trials must all be on good balls. Balls which would be counted as "balls" are not to be

included in the 10 trials. The first ball is hit to the left of the line dividing the diamond and the second to the right, and so on alternating left and right on each hit.

- c. *Score.* Score two points if batted ball strikes "fair" and within the proper area, and one point if the batted ball strikes beyond the line from first to third but not in the proper area (alternately left or right of the line from home to second). Score one point if a batted ball first strikes "fair" within the area of the diamond and the line from 1st to third.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Catching Fly Balls

- a. *Set-up of equipment.* Brick wall or other surface from which balls will rebound. Line on wall 15 feet from the floor and parallel to it. 12 inch softball in good condition. *Starting line* on floor 10 feet from the wall.
- b. *Description of the test.* Player stands on the starting line holding the ball. On signal, the player repeatedly throws the ball against the wall and to a height that it strikes the wall above the 15 foot height line. She continues throwing and catching for a period of 30 seconds. Balls not reaching the 15 foot height are scored zero. If the player drops the ball she should recover it and go on from that point. After the first throw the player may move about, but all throws *must* go above the 15 foot height line. Two trials *may* be allowed.
- c. *Score.* Score is the number of times the ball is caught within the

30 second period. If the ball is fumbled and dropped no score is counted but the player picks up the ball and continues for the 30 second period of time.

Scoring Scale

Raw Score	Scale Score
25-29	5
20-24	4
12-19	3
6-11	2
1-5	1

4. Catching Grounders

- Set-up of equipment.* A solid brick wall or other surface from which ground balls will rebound. Lines parallel to the wall drawn 10 and 20 feet from it. Stop watch, 12 inch softball.
- Description of the test.* Player stands, holding the ball, on the line 20 feet from the wall. On signal she throws the ball against the

wall so that it will rebound a grounder, catches it, and repeats this as many times as possible within a 30 second period. The ball must be caught and thrown within the area marked by the two parallel lines. Two trials may be allowed.

- Score.* Score is the number of times the ball is successfully caught during the period of 30 seconds and while standing within the 10-20 foot area. If a player fumbles and drops the ball she should recover it and go on from that point.

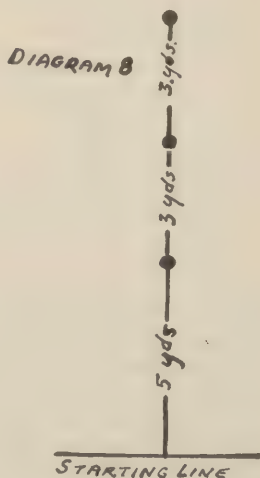
Scoring Scale

Raw Score	Scale Score
25-29	5
20-24	4
12-19	3
6-11	2
1-5	1

SOCCER¹⁰

1. Dribble

- Set-up of equipment.* Three small chairs (so ball will not be caught in the legs) or other object, approximately 12 x 12 x 12 inches. Well inflated soccer ball, stop watch. Draw a starting line, and 5 yards from it place the first chair. Place the other chairs three yards apart. All obstacles must be in line and perpendicular to the starting line. (See Diagram 8.)
- Description of the test.* Player stands behind the starting line, ball on the line. On signal, she dribbles the ball in and around the three chairs, going to the right of the first chair and then alternating, and back across the starting line. Be sure the player actually dribbles the ball. *The player must recross the starting line*



with the ball. Disqualify if this is not done. Two trials may be allowed, score to be the better of the two if two trials are taken.

- Score.* Time is taken from instant the ball is first kicked until the instant the player recrosses the

¹⁰Rodgers, E. G. & Heath, M. L. "A Study in the Use of Skill and Information Test in Soccer." *Research Quarterly*, 3:33-53 (Dec. 1932). Used with permission.

starting line. Take time with a stop watch, in seconds and fractions of seconds.

Scoring Scale

Raw Score	Scale Score
9 sec.-15 sec.	5
16 sec.-23 sec.	4
24 sec.-34 sec.	3
35 sec.-42 sec.	2
43 sec.-49 sec.	1

2. Throw-In

- a. *Set-up of equipment.* Well inflated soccer ball. Draw on the ground a target, the center of which is six yards from the side line. This target is to be two feet in diameter. Using the same center point construct around this first circle another circle four feet in diameter. (See Diagram 9.)



- b. *Description of the test.* Player stands on the "side line" with the ball and using the legal throw-in (overhead) attempts to hit the target on the ground. She is allowed ten trials. Regulation soccer rules govern the throw.
- c. *Score.* Score two points if the ball hits within the inner target. Score one point if the ball hits on the line of the inner circle or hits within the outer circle. If the ball hits on the line of the outer circle, the score is zero.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Place Kick for Goal

- a. *Set-up of equipment.* Well inflated soccer ball. Soccer goal area divided into three equal sections. Sections can be marked by pushing stakes into the ground or marking lines on the ground with lime.
- b. *Description of the test.* Player places the ball on the penalty kick mark and is given ten trials to kick the ball through the goal. Goal is not guarded by the goal keeper.
- c. *Score.* Score two points for a goal kicked where the ball passes through the outer section of the goal area. Score one point for a goal kicked where the ball passes through the center section of the goal. The player is credited with a score if she kicks a ball which hits the goal post and rebounds through the goal.

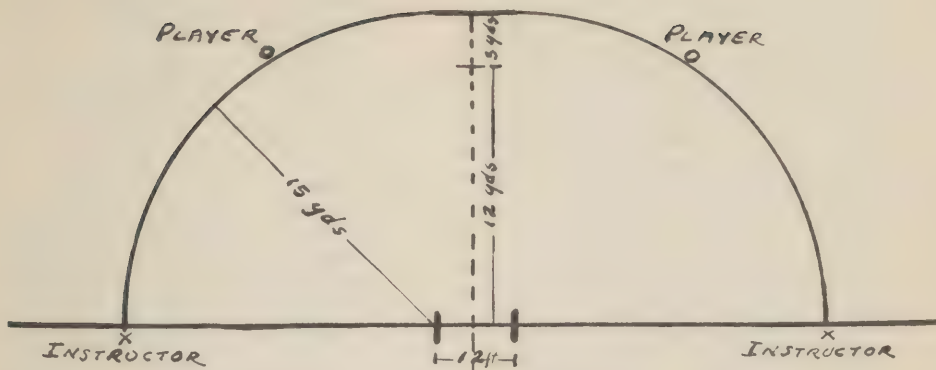
Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

4. Kicking a Rolling Ball

- a. *Set-up of equipment.* Well inflated soccer ball. Semi-circle outlined in front of the goal. (See Diagram 10.)
- b. *Description of the test.* Instructor stands with the ball on the end line at the point where the semi-circle touches it. Player taking the test stands on the circle line, diagonally opposite the instructor. As the instructor rolls the ball, with fairly good speed, the player

DIAGRAM 10



comes in on the ball, and attempts to kick it through the goal. The ball is rolled five times from the right and five times from the left. The ball which the instructor rolls must be moving with good average speed.

- c. *Score.* Score two points for a successful kick through the goal. Score one point for each ball which does not go through the goal, but crosses the end line

within the limits marked by the semi-circle. The ball must be kicked before the player crosses a line from the center of the goal to the penalty kick mark.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

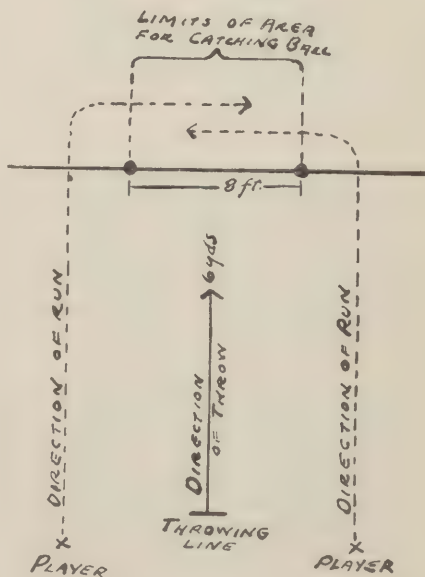
SPEEDBALL

1. Catching a Forward Pass

- a. *Set-up of equipment.* On the end line of the field set up two jumping standards 8 feet apart. Stretch a rope between the jumping standards five feet from the ground. Mark a throwing line 6 yards from the jump standards and centered with the jump standards. (See Diagram 11.) Well inflated soccer ball.

- b. *Description of the test.* Player stands back in the field to the right (5 trials) and to the left (5 trials) of the throwing line and *behind* the thrower, to start her run. A reliable thrower stands, with the ball, on the throwing line. On the instructor's signal "go" player starts her run, and as she crosses the throwing line the ball is

DIAGRAM 11



thrown so that it goes over the end line between the jump standards and above the stretched rope, to be caught by the player being tested, within the limits of the area marked by the jump standards. Five trials are taken running from the right and five from the left.

- c. *Score.* Score two points for each successful catch within the 8 foot area—as marked by the jump standards, and one point for each successful catch outside the area marked by the jump standards.

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

2. Dribble and Kick for Accuracy

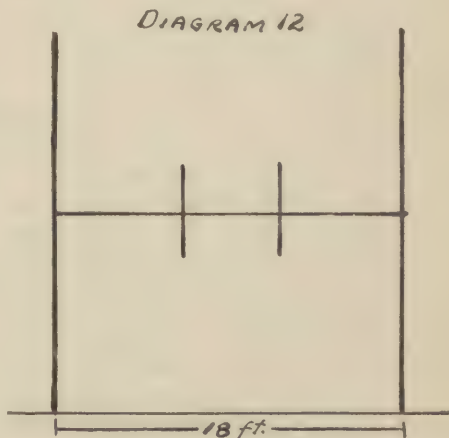
- a. *Set-up of equipment.* Divide the area between the goal posts into 3 sections by placing one jump standard 5 feet from each goal post. This makes the center area 8 feet wide. Place one mark in the field 22 feet from the goal and another 10 feet from it. These two marks must be in line and centered with the goal.
- b. *Description of the test.* The player stands behind the mark which is 22 feet from the goal; ball is placed on the mark. On signal, she dribbles the ball up to the 10 foot mark and then shoots for goal. Ten trials are allowed.
- c. *Score.* Score two points for each goal kicked when the ball passes through the outer section of the goal area. Score one point for each goal kicked when the ball passes through the center section of the goal area.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Drop Kick

- a. *Set-up of equipment.* Well inflated soccer ball. Cross bar of goal posts divided into 3 areas 6 feet in width. Where goals are made of metal these areas may be marked by taking a piece of board 18 feet long and at 6 feet intervals, nailing a piece of lath perpendicular to it, and then fastening the 18 foot board to the cross bar of the goal post. (If this is impracticable, streamers may be tied or areas marked by paint and more care taken by instructor in judging areas.) (See Diagram 12.)



- b. *Description of the test.* Player stands behind line 6 yards from goal posts and attempts to drop kick 10 consecutive balls over the cross bar. Regulation speedball rules govern the kick.
- c. *Score.* Two points for each ball kicked over the cross bar and through the marked center area. One point for each ball kicked

over the cross bar and through either marked area adjacent to the goal posts.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

4. Lifting Ball to Self

- Set-up of equipment.* Well inflated soccer ball. Two marks on the ground, 12 feet apart.
- Description of the test.* Instructor stands on end mark and rolls the ball to the player who is standing

on the other mark 12 feet away. Player lifts the ball to herself using either of the two legal forms as described in the official rules. Ten trials are given. The player must use 5 jump lifts and 5 one-foot lifts.

- Score.* Two points for each successful catch. One point for a ball fumbled but caught before it touches the ground.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

VOLLEYBALL

1. Repeated Volleys Test

- Set-up of equipment.* Wall from which ball will rebound. Line 10 feet long drawn on the wall at the net height (7 feet 6 inches) from the floor. Line on floor 10 feet long, 3 feet from and parallel to the wall. Well inflated volleyball. Stop watch.
- Description of the test.* Player stands behind the 3 foot line, and with underhand movement tosses the ball to the wall. When it returns she shall repeatedly volley it for a period of 30 seconds against the wall so that it hits above net line. *It is hit just once on each volley.* If ball gets out of control it must be recovered and brought back to the 3 foot line and started over. Penalty is loss of time.
- Score.* Number of times ball is clearly batted (not tossed) against wall from behind line and so that it hits the wall above the net line. (The throw by which the ball is put in play is not to be counted in the score.)

Scoring Scale

Raw Score	Scale Score
40-44	5
32-39	4
21-31	3
13-20	2
8-12	1

2. Repeated Volley with a Set-Up

- Set-up of equipment.* Wall from which the ball will rebound. Line 10 feet long on wall drawn at net height (7 feet 6 inches) from floor. Line on floor opposite wall marking 10 feet long, 3 feet from wall. Well inflated volley ball. Stop watch.
- Description of the test.* The player stands behind the 3 foot line and with an underhand movement tosses ball to the wall. When it returns she taps it *once* before hitting it against the wall. Thirty seconds are allowed in which this is repeated as many times as possible. The ball must hit the wall above the net line. If the ball gets out of control it will be recovered and brought back to the 3 foot line and started over. Penalty is loss of time.

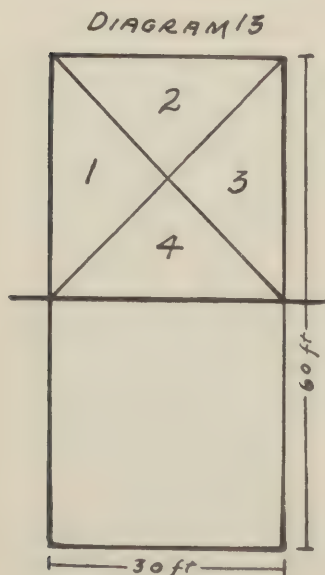
- c. *Score.* Number of times ball is clearly batted (not tossed) against wall from behind line above net in 30 seconds. (The throw by which the ball is put in play is not included in the score.)

Scoring Scale

Raw Score	Scale Score
34-38	5
27-33	4
12-26	3
5-11	2
1-4	1

3. Serving Test

- a. *Set-up of equipment.* Well inflated volley ball; Volley ball court equipped with net, and set-up according to regulation volley ball rules. A line is drawn from each corner of the receiving court to net diagonally opposite as in accompanying diagram, thus dividing the receiver's court into four areas. (See Diagram 13.) Number as indicated by the diagram.



- b. *Description of the test.* Player stands in proper serving area op-

posite the divided receiver's court. Player serves the ball into area one, and into each of the others in consecutive order. A total of 10 trials are allowed. Serves must be made to each area in consecutive order—1, 2, 3, 4, 1, 2, etc.

- c. *Score.* Two points are scored for each ball that lands within the correct box. One point for crossing net and landing "good" in the court.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

4. Set-Up and Pass

- a. *Set-up of equipment.* As for test 3.
- b. *Description of the test.* Instructor stands in the center of the divided receiver's court and throws ball over net to the player who is standing in center of opposite court. Player sets up the ball and attempts to pass it into area one. Ten trials are required, the ball must be hit into areas in consecutive order, that is, 1, 2, 3, 4, 1, 2, and so on.
- c. *Score.* Two points are scored each time ball is sent over the net and lands within the correct area. One point is scored if it crosses net and lands within the court but not in correct area.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

INDIVIDUAL AND DUAL SPORTS AREA

There are twenty activities for which measures for the appraisal of achievement are provided in the individual and dual sports area. As tests are unique to the activity, so also are the scoring scales unique to it. Care must be taken to see

that the correct scoring scales are used.

To determine the meaning of the score in relation to certification, or to determine the meaning of one's own score, refer to Table I (page 9).

ARCHERY

The Junior Columbia Round (24 arrows from 40, 30 and 20 yds.) shall be the basis for measuring achievement in archery.

The round may be completed on *one* day, or, if needed, on *three* consecutive days of the regular archery season. *Official rules for the conduct of archery*

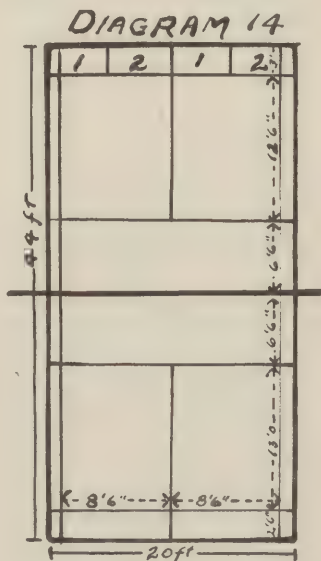
tournaments must be observed.

Scoring Scale	
Raw Score	Scale Score
425 +	5
375-424	4
275-374	3
225-274	2
200-224	1

BADMINTON

1. Long Serve

- Set-up of equipment.* Regulation badminton court, net, racquet, and birds. Draw a line parallel to and 3 feet from the back line of the court. Divide this area into 4 equal areas (4 areas each 3 x 5 feet). (See Diagram 14.)
- Description of the test.* Player's position while serving is governed by regulation badminton laws. Serving first from the right court and then from the left, and alternating each time, the player takes 10 trials (5 from each court) to serve into the marked areas at the back of the court.
- Score.* If serving from the *right* court the player sends the bird into the area closest to the center, score two points, and one point if served to the outside area. If serving from the *left* court, score two points if the bird lands in the *outer* area, and one if it strikes



within the area closest to the center of the court. (Diagram 14 is marked to indicate score values for each area.)

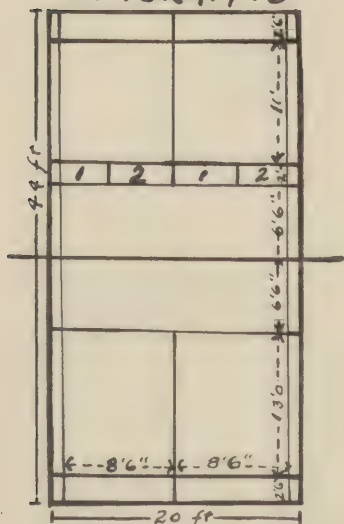
Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

2. Short Serve

- a. *Set-up of equipment.* Regulation badminton court, net, racquet, and birds. Draw a line parallel to and two feet from the short service line. Divide this area into four equal parts. (4 areas, each 2 x 5 feet.) (See Diagram 15.)

DIAGRAM 15



- b. *Description of the test.* Player's position while serving is governed by regulation badminton laws. Serving first from the right court and then from the left, and alternating each time, the player takes 10 trials (5 from each court) to serve into the marked areas adjacent to the short service line.
- c. *Score.* If serving from the *right* court, score two points if the player sends the bird into the area closest to the *center*, and one point if served to the area on the *outside*. If serving from the *left*

court, score two points if the bird lands in the *outer* area, and one if it strikes within the area closest to the *center* of the court. (Diagram 15 is marked to indicate score values for each area.)

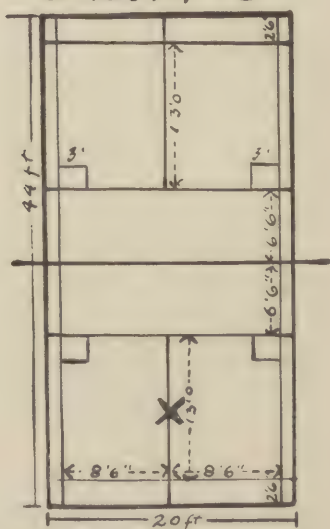
Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Footwork

- a. *Set-up of equipment.* Regulation badminton court, net, racquet, and birds. Mark four three-foot squares within the singles service court, and which coincide with the boundary and short service lines. Place a player's mark (x) in one court, on the line dividing the court and ten feet back from the short service line. (See Diagram 16.)

DIAGRAM 16



- b. *Description of the test.* A reliable assistant stands in the right hand square (right hand to her) of the court opposite the player. The assistant sends the bird di-

rectly across the net into the square marked on the floor. The player standing at (x) moves in to her left hand square to receive the bird sent over by the assistant and hits it back across the net so that it strikes within the court. The next trial is taken from the opposite side of the court. Ten trials are allowed, five from the right and five from the left.

- c. *Score.* Score 2 if the bird is sent across the net so that it lands "good" within the boundaries of the singles court. Score 1 if the bird is hit but *not sent* over the net so that it lands "good".

Scoring Scale

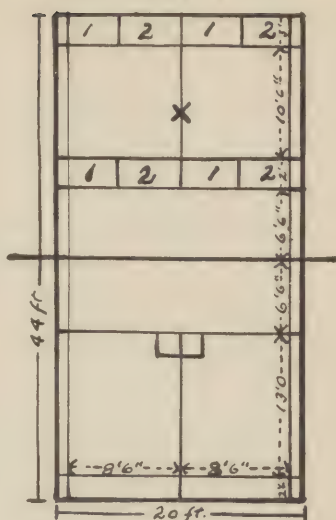
Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

4. Placement of Shots

- a. *Set-up of equipment.* Regulation badminton court, net, racquet, and birds. Retain the marked areas as herein described for both the long and short serves. (See Tests 1 and 2.) Place an assistant's mark on the dividing line between the two courts, and 5 feet back from the short service line. In the opposite court mark a 3 foot square which coincides with the short service line and is centered on the dividing line between the two service courts. (Mark area where player being tested stands.) (See Diagram 17.)

- b. *Description of the test.* Player stands in the "three foot square" to receive the bird from the assistant who is standing opposite him. Restricted areas for both assistant and player demands that trials be

DIAGRAM 17



reasonable ones. Ten trials are allowed to hit the received bird alternately to the front areas right and left, and to the rear areas right and left. Since a high score is desired player aims to area scored 2 in right and left courts.

- c. *Score.* Two if the bird lands good within the areas nearest the center in the *right* court, and one point if the bird lands good in the outside area of the right court. Score two if the bird lands good in the outside areas of the *left* court, and one if it lands in the inside area. (See Diagram 17 for help in understanding the scoring.)

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

BICYCLING

Directions—Do all the activities listed below *in order*. A second trial may be permitted.

1. Without touching either border of a straight, 3 foot lane, ride 75 feet on level ground, in not *less* than $\frac{1}{2}$ minute.
2. Demonstrate simple mounting and dismounting, and quick stopping without skidding the rear wheel.
3. Demonstrate "ankling" a bicycle in contrast with "bike-pushing" or "arch breaking."
4. Without touching either border line ride in clockwise direction twice around a circular lane 4 feet wide (inner circle having a diameter of 20 feet) using only the left hand to steer the bicycle. Ride the same lane in *counter-clockwise* direction using only the *right* hand to steer.
5. Stop, and dismount, during an uphill climb maintaining a right angled position of the bicycle with the ground.
6. Mount and start on an uphill incline of 30 degrees or more.

7. Mount and start on a downhill incline of 30 degrees or more; dismount on the way down, (keeping the bicycle in a right angled position) remount and continue on down the hill.
8. Demonstrate ability to repair tire.
9. Give regulations for operation of a bicycle in a given locality, including regulation for safe night riding.
10. Demonstrate method of packing equipment for balance and economy of space.

Score. Two points for each of the above activities completed on the first trial. Score one point if completed on the second trial. No part scores are allowed.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

BOWLING

At the end of the regular season, 2 or 3 consecutive bowling days shall be designated for the test. Bowling average shall be the basis for measuring achievement in bowling. The average score shall be figured on *six* games to be rolled in accordance with regulation bowling rules. (Observe foul lines, etc.)

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
130 +	5
120-129	4
100-119	3
90-99	2
85-89	1

CROQUET*

1. **Driving the Ball Through a Wicket**
 - a. *Set-up of equipment.* Two croquet balls, one mallet, one wicket.
 - b. *Description of the test.* With a pendulum swing, drive the ball from a starting point of one yard

from the wicket, to a point of not less than one foot, or more than two feet, beyond the wicket so that it passes under the wicket without touching. Five trials are allowed.

- c. *Score.* Each success counts one point.

*NOTE: For clarification of terms consult: *Croquet, Rules of the Game*. Spaulding's Athletic Library, Auxiliary Series. American Sports Publishing Co. 1921.

2. Driving the Ball from an Angle

- a. *Set-up of equipment.* Two croquet balls, one mallet, one wicket.
- b. *Description of the test.* With a pendulum swing drive the ball from a starting point of one yard from the wicket and at an angle of 30 degrees. Three trials are taken from the right and two from the left. The ball must stop, after it is sent through the wicket, at a point of not more than one foot or less than two feet from the nearest point of the wicket to the ball. Five trials are allowed.
- c. *Score.* Each success counts one point.

3. Accuracy Drive

- a. *Set-up of equipment.* Two croquet balls, one mallet. Circle one foot in diameter. Starting mark two yards from the center of the circle.
- b. *Description of the test.* Drive a ball from the starting mark to the circle. The ball must lie totally within the circle and not touch the boundary line. Five trials are allowed.
- c. *Score.* Each success counts one point.

4. Taking Croquet

- a. *Set-up of equipment.* Two croquet balls, one mallet.
- b. *Description of the test.* "Taking Croquet" for a distance of two yards. Place one ball in contact with another ball, and then make the stroke. The ball thus "cro-

queted" (not the striker's ball) must move two yards. The striker's ball may or may not move that distance. The striker shall not place his foot on either ball while making the stroke. Five trials are allowed.

- c. *Score.* One point is scored if the "croqueted" ball has moved at least two yards.

5. Jump Shot

- a. *Set-up of equipment.* One wicket, two balls, one mallet. Ball is placed on the ground five yards in front of the wicket. A second ball is placed one yard beyond the wicket and in line with the first ball.
- b. *Description of the test.* The "jump shot" is taken, hitting the first ball so that it jumps the wicket in such a way as to hit or glance off the second ball. (See Diagram 18 showing how it is taken.) Five trials are allowed.

DIAGRAM 18



- c. *Score.* One point for each success. (Score on croquet is the sum of points made on each test item.)

Scoring Scale

Raw Score	Scale Score
22-25	5
18-21	4
12-17	3
6-11	2
1-5	1

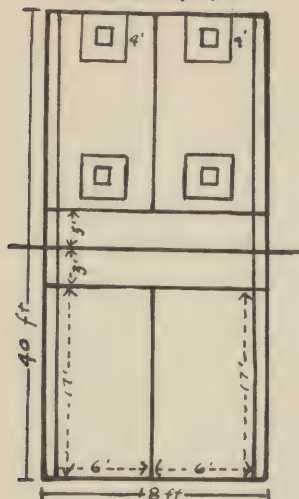
DECK TENNIS

1. Serve

- a. *Set-up of equipment.* Within the back half of the receiver's court outline two targets, each 4 feet square and coinciding with the base line of the court, center these targets in each half of the court. Within the four foot square draw

another one, two feet square. Two feet from the line marking the neutral area draw another set of two targets and center them in each half of the court identical in size with the first two. (See Diagram 19.) Tennikoit ring.

DIAGRAM 19



- b. *Description of the test.* Player stands in the server's position and takes 10 trials to serve the ring into the targets outlined in the receiver's court. Begin with the target in the left back court and take each try in a different target, going clockwise in order around the set.
- c. *Score.* Two points if the ring lands within the inner target, or the line marking it; and one point if the ring lands within the outer target, or on the line marking it.

Scoring Scale

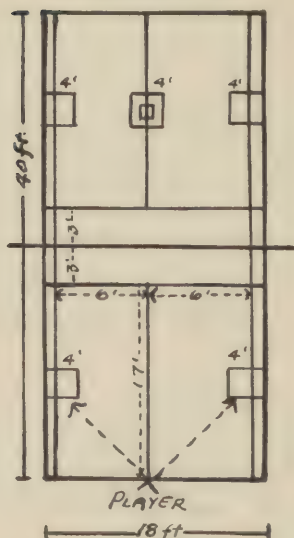
Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

2. Placement of Shots

- a. *Set-up of equipment.* In the center of the receiving court, draw a target 4 feet square and, inside it another, 2 feet square. Midway between the base line and line marking the neutral area and coinciding with the side line—make another 4 foot square, one on

either side of the net and on both sides of the court. (See Diagram 20.) Tennikoit ring.

DIAGRAM 20



- b. *Description of the test.* Player stands at the center of the base line. A reliable assistant stands in a square at the side of the opposite court for the purpose of putting the ring into "play." The ring is thrown from the square at the side of the court into the square at the side of the receiver's court, and is caught there by the player and is immediately sent over the net into the target in the center of the court. Five trials are taken from the right and five from the left.
- c. *Score.* Two points if the ring hits within the center target or on the line marking it, and one point if the ring hits within the outer target or on the line marking it.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Throw and Catch

a. *Set-up of equipment.* Stretch a rope across the court, seven feet from the floor. Mark the lines indicating the neutral area of the court. Follow regulation Deck Tennis rules. Tennikoit ring.

b. *Description of the test.* Player stands on the line marking the neutral area of the playing court, tennikoit ring in hand. On signal, she tosses the ring over the rope, runs across to the opposite line (that marks the neutral area), catches it, throws it back over the rope, runs across to the opposite line to catch it. This is repeated as many times as possible within

a period of 45 seconds. If the ring is dropped it is recovered and the player goes on, penalty being in loss of time. Each time the ring is thrown it must be from the line which marks the neutral area.

c. *Score.* Number of times the ring is caught after having been thrown across the rope within the 45 second period of time.

Scoring Scale

Raw Score	Scale Score
40-45	5
30-39	4
15-29	3
5-14	2
1-4	1

FENCING

*Demonstrate the ability to: **

Salute	<i>Parries in:</i>
On guard	Quarte
Advance	Quinte
Massard	Sixte
Leap	Septime
Lunge and recover	Octave
Riposte	Direct parry
<i>Parries in:</i>	Circular parry
Prime	Opposition
Seconde	Tap

Tierce
Score. For successful execution of each item score one point.

Contraction

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

GOLF¹¹

This test is so constructed that a test of ability with every club in the golfer's bag can be made if it is so desired. Since many golfers do not use all possible clubs this test uses Driver or Brassie, Mid-Iron, Mashie, Niblick, and Putter. The test thus includes five elements or test items.

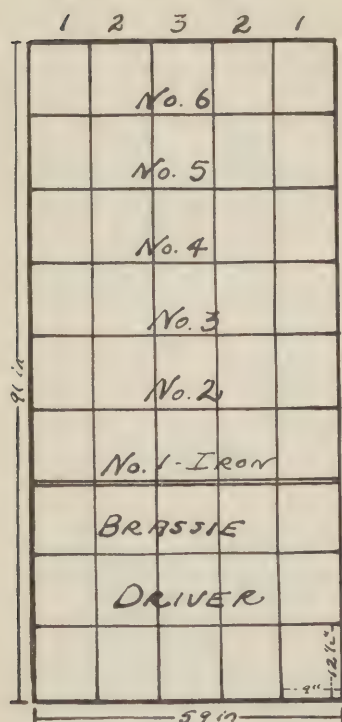
1, 2, 3—(Driver or Brassie, Mid-Iron, Mashie)

a. *Set-up of equipment.* Put up a target in a golf driving cage which is 59 inches wide and 91 inches long. Divide this target

into 45 squares, each of which is 9 x 12½ inches. (See Diagram 21.) Hang the target in the driving cage so that the top of it is 6 inches from the top of the cage, and 20 inches from the ground. Label the lines of squares from the top down: No. 6, No. 5, No. 4, No. 3, No. 2, No. 1, Brassie, Driver. Place a mat on the ground 15½ feet from the target from which the ball can be hit. (Watch safety in being sure mat is placed at edge of cage so that hooked or sliced balls will be caught within the cage.) Driver or brassie, mid-iron, and mashie. Golf balls.

¹¹Golf target size and description adapted from one used by John Moynihan, Pro at Troy Municipal Golf Course.

DIAGRAM 21



b. *Description of the test.* From the shooting mat take 10 trials with each of the three clubs (Driver or Brassie, Mid-Iron, Mashie) to hit the middle column of squares (the one marked 3) and above the line marked for a particular club. (See Diagram 21.)

c. *Score.* Two points for each ball hit which strikes within the middle column of squares and above the line marked for a particular club. Score one point if the ball hits above the line marked for the club though not within the middle square.

Scoring Scale

Driver or Brassie

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

Mid-Iron

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

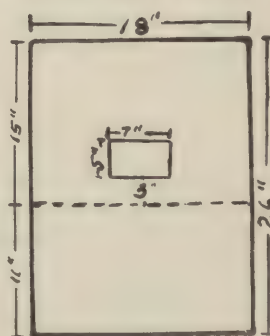
Mashie

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

4. Chip Shot (Niblick)

a. *Set-up of equipment.* Niblick. Golf balls. Set up a target (preferably made of cloth) with protecting sides, 18 x 26 inches in size. Put a hole 3 inches above center, oblong in shape, and 5 x 7 inches in size. Draw a line across the middle of the target. Place a mat or mark a line 9 feet from the base of the target from which the ball can be hit. (See Diagram 22.)

DIAGRAM 22



b. *Description of the test.* Allow 10 trials to hit the ball with the niblick, from the shooting line to the target. The object is to hit the ball into the hole in the target.

c. *Score.* Two points if the ball goes through the hole in the target, and one point if it hits the target above the center line.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

5. Putting

- Set-up of equipment.* Place a mark (a small piece of paper will do) 30 feet from the pin on a level green. Putter. Golf balls.
- Description of the test.* Player

taking the test places the ball on the green 30 feet from the pin and putts out. Take 10 trials.

- Score.* The sum of the number of strokes necessary to hole out on the 10 trials.

Scoring Scale

Raw Score	Scale Score
12-10	5
16-13	4
21-17	3
25-22	2
28-26	1

HANDBALL

1. Service

- Set-up of equipment.* Regulation handball court, wall, and ball (see N.S.W.A. Official Guide, 1942-43, Recreational Games and Sports, p. 54).
- Description of the test.* The server stands within the square formed by the two side lines, the short and the service lines, bounces the ball on the floor and strikes it to the front wall on the first bounce. The served ball must rebound from the wall to any spot within the court beyond the short line and inside the area bounded by the rear line and two side lines, or on these lines. Ten trials are required. A missed ball constitutes a trial.
- Score.* Each successful trial scores two points.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

2. Return of Service

- Set-up of equipment.* Same as for Test 1.
- Description of the test.* A reliable assistant serves the ball ac-

ording to the official rules. The player stands behind the short line until the ball has rebounded across the short line. Following a good service (described in Test 1) the player must return the ball to the wall. It may be played on the fly or first bounce, but must strike the front wall after it is returned before hitting the floor, and must rebound into the court. If the returned ball rebounds outside of the court, it is not a good return. Ten trials are required.

- Score.* Each good return scores two points.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Repeated Volleys

- Set-up of equipment.* Regulation handball court, or court marked out in a gymnasium. Handball. Stop watch.
- Description of the test.* Player stands within the square formed by the short and service lines, and the two side lines. On signal player bounces the ball and serves it to the front wall. After the ball

rebounds beyond the short line, the player returns the ball to the front wall and continues returning it for 30 seconds. If the ball gets out of control it must be brought back to service area and started over. Penalty is loss of time.

- c. *Score.* Number of times ball is volleyed to wall within the 30 second period.

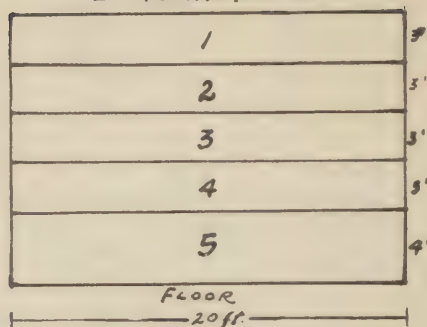
Scoring Scale

Raw Score	Scale Score
46-50	5
37-45	4
24-36	3
15-23	2
10-14	1

4. Accurate Service

- a. *Set-up of equipment.* Regulation handball court wall. Ball. Mark a line across the width of the handball court, four feet from and parallel to the floor, make a second one three feet above the first, a third one three feet above the second, and a fourth one three feet above the third. (See Diagram 23.) Number these areas from the top down, 1, 2, 3, 4, and 5. These numbers also indicate the score value of the area.

DIAGRAM 23



- b. *Description of the test.* Player makes a legal serve, trying to strike area 5, this being the most difficult and most likely to result in service aces. Ten trials are required. A missed ball constitutes a trial.

- c. *Score.* According to the area in which the ball strikes the wall. (See Diagram 23.) A perfect score would total 50 points.

Scoring Scale

Raw Score	Scale Score
46-50	5
37-45	4
24-36	3
15-23	2
10-14	1

HORSESHOES

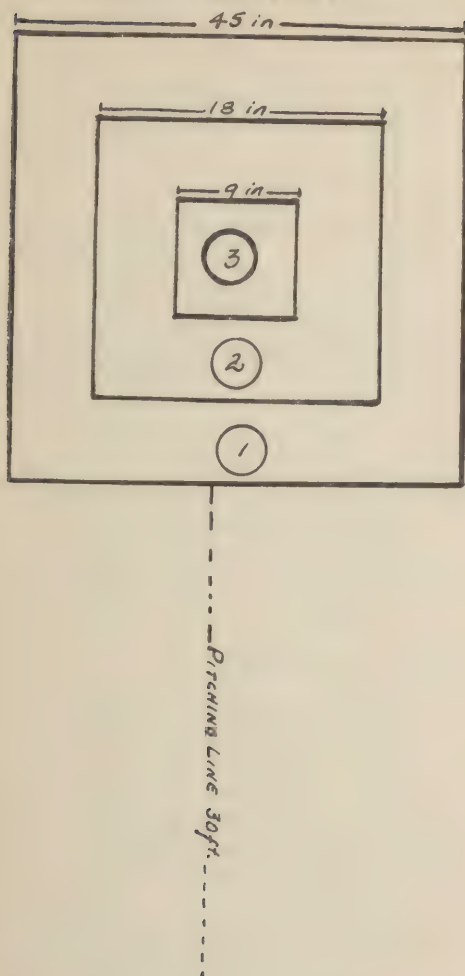
1. Pitching for Accuracy

- a. *Set-up of equipment.* Ten horseshoes. Three square targets, one inside the other as follows: center one, 9 inches, second one 18 inches, outer one 45 inches. Pitching line 30 feet from the edge of the outer target. (See Diagram 24.) Score values for each area are circled on the diagram.
- b. *Description of the test.* Regulation horseshoe rules are to be observed. Player stands at pitching line and pitches shoes to target. If player steps over pitching line in

delivering his shoe it is not scored and counts as a trial. Shoe must be removed following each trial. Ten trials are required.

- c. *Score.* Three points if the shoe lies completely within the center square, two points if it lies within the second area, and one point if it lies within the outer area. A shoe which lies on the line between the center and second area scores 2, if on the line between the second and outer area it scores 1, and if on the line marking the outer area, 0.

DIAGRAM 24



Scoring Scale

Raw Score	Scale Score
26-30	5
21-25	4
12-20	3
6-11	2
1-5	1

2. Ringer Test

- Set-up of equipment.* Stake set 30 feet from pitching line, 10 horse-shoes.
- Description of the test.* Player stands at pitching line and tries to score ringers. If the player crosses the pitching line while pitching, no score is made but a trial is counted. Shoe must be removed following each trial. Ten trials are required.
- Score.* Each ringer scores two points. If shoe touches the stake but is not a ringer, it scores one point.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

HORSEBACK RIDING¹²

- Demonstrate ability to mount and dismount from the proper side. One trial is allowed. Score one point if correctly done on one trial.
- Demonstrate knowledge of bridling and saddling; check bit, girth, and be able to adjust own stirrups. Only one trial is allowed. Score

one point if correctly done on one trial.

3. Post in Rhythm 400 Feet

- Set-up of equipment.* Poles at the corners of the ring.
- Description of the test.* Rider must make horse follow course at a trot not slower than nine m.p.h. Rider must keep posting rhythm throughout.

Failure: Not staying outside corner poles; not keeping horse at a

¹²Minas, E. K. "Tests of Riding Ability"—Tests 3-11 quoted in this battery from N.S.W.A. *Official Sports Guide*, A. S. Barnes & Company, 1942-43. Used with permission of the publisher.

trot of at least nine miles per hour; missing counts in posting; bouncing twice on each count.

- c. *Score.* Two points if passed on the first trial, and one if passed on the second.

4. Walk—Two Figure Eights

- a. *Set-up of equipment.* Stop watch; sets of two poles set twenty feet apart.

- b. *Description of the test.* The rider starts in back of, and a little to the left of, the nearest pole, 30 seconds of time are allowed. On the word "Go" she walks the horse around the far pole, making a left hand turn, returns, and makes a right hand turn around the near post. Without stopping, she repeats the course, so as to complete two figure eights.

Failure: Not making correct turns. Failing to complete test in thirty seconds.

- c. *Score.* Two points if passed on the first trial, and one if passed on the second.

5. Trot—Two Figure Eights

- a. *Set-up of equipment.* Stop watch, two sets of poles set forty feet apart.

- b. *Description of the test.* Rider makes two figure eights at a trot, following the same figure described in test four. Thirty seconds of time are allowed.

Failure: Cantering; failure to make prescribed figure; failure to complete test in thirty seconds.

- c. *Score.* Two points if passed on the first trial, and one if passed on the second.

6. Canter from a Walk

- a. *Set-up of equipment.* None.

- b. *Description of the test.* Rider must start horse immediately into a canter on signal. This is to be

done twice in succession to count as one trial.

Failure: Trotting before breaking into canter, not continuing the canter at least fifty feet.

- c. *Score.* Two points if passed on the first trial, and one if passed on the second.

7. Canter, 400 Plus Feet

- a. *Set-up of equipment.* Poles at corners of the ring.

- b. *Description of the test.* As signal "Canter" is given, rider must put horse into a canter and *continue* at a canter for 400 feet.

Failure: Not getting horse to canter within thirty feet; trotting; cutting corner poles; not continuing for full distance.

- c. *Score.* Two points if passed on the first trial, and one if passed on the second.

8. Trot, 800 Plus Feet

- a. *Set-up of equipment.* Poles at corners of ring; stopwatch.

- b. *Description of the test.* Start from a standstill. On signal "Go" put horse into a trot, keep at a trot twice around the ring. One minute and twenty seconds of time are allowed.

Failure: Not staying outside corner posts, cantering, failing to complete course in one minute 20 seconds.

- c. *Score.* Two points if passed on the first trial, and one if passed on the second.

9. Canter Without Stirrups, 400 Plus Feet

- a. *Set-up of equipment.* Poles at corners of the ring.

- b. *Description of the test.* With stirrups crossed in front of saddle, and without holding onto the saddle, rider must canter once around the ring.

Failure: Not cantering 400 feet; cutting corner posts; racing; holding on to saddle.

- c. *Score.* Two points if passed on the first trial, and one if passed on the second.

10. Post 200 Plus Feet with One Foot Out of Stirrup and Find Stirrup in Ten Feet

- a. *Set-up of equipment.* Marks 10 feet apart on a 200-foot straight stretch of fence, plus a 200-foot straight away.

- b. *Description of the test.* Horse trotting at least nine m.p.h., rider removes one foot from the stirrup. Judge gives the signal "Now" (signal to remove one foot from the stirrup) after the rider has gone not less than 200 feet. Rider finds stirrup as rapidly as possible. Judge gives the signal when horse's nose is opposite the first mark on the fence.

Failure: Not getting clean-cut posting rhythm for at least 200 feet; failure to ride at least nine m.p.h. at a trot; looking down while finding stirrup; resting hands on horse or saddle; jerking horse or slowing speed; failure to find stirrup within ten feet.

- c. *Score.* Two points if passed on the first trial; one if passed on the second.

11. Canter—Two Figure Eights Changing Leads

- a. *Set-up of equipment.* Two poles set sixty feet apart; line six feet long marked on ground between the two poles.

- b. *Description of the test.* Rider is to make two adjacent circles, obtaining change of lead when swinging into the other circle. Rider starts behind pole "A", getting a right lead; when halfway between poles, swings to left, getting a left lead, rides around pole "B"; when half-way back turns right, getting right lead, and rides around pole "A". This makes one figure eight. Without stopping, the same is repeated.

Failure: Not keeping horse in a canter; not keeping close to poles when turning; not passing within six feet of center line; not changing leads when changing direction of circle.

- c. *Score.* Two points if passed on the first trial, one if passed on the second.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

ICE SKATING

The Test:

1. Do straight skating forward and stopping.
2. Cut a circle left (right foot goes over left in each stroke).
3. Cut complete circle right.
4. Skate backward 30 feet.
5. While in motion turn from forward to backward, and from backward to forward.
6. Cut a circle backward left.
7. Cut a circle backward right.

8. Do a quick stop from a straight skate at full speed.

9. Do a figure eight, right outside edge forward, and left outside edge forward.

10. Do a figure eight, right inside edge forward, and left inside edge forward.

Score. Two points are scored if correctly done in the first trial, one if done on the second. Only two trials are allowed.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

PADDLE TENNIS

1. Rally

a. *Set-up of equipment.* Backboard with line drawn across it at a height of two feet six inches to represent the net. Stop watch. Balls and paddle. Draw a restraining line 5 feet from and parallel to the base of the backboard and a starting line 10 feet from and parallel to the base of the backboard.

b. *Description of the test.* Player stands, two balls and paddle in hand, on the 10 foot line. On signal the ball is dropped and put in play against the backboard. On the rebound it is hit again and so on for as many times as possible within a 30 second period. At no time may the player move nearer the wall than the 5-foot line, and the ball must always be hit so that it strikes the wall above the net line if a score is to be counted. If the ball is missed, another ball is put in play from the 10-foot line. As many balls as are needed can be used, and any stroke or combination of strokes may be used. Balls may be hit from nearer the backboard than the 5-foot restraining line, though no balls so hit may be counted in the score.

c. *Score.* One point for each ball striking the wall on or above the net line, and hit from behind the 5-foot restraining line, ball having been put in play from behind the 10-foot line. Allow 3 trials and final score is the sum of the scores on 3 trials.

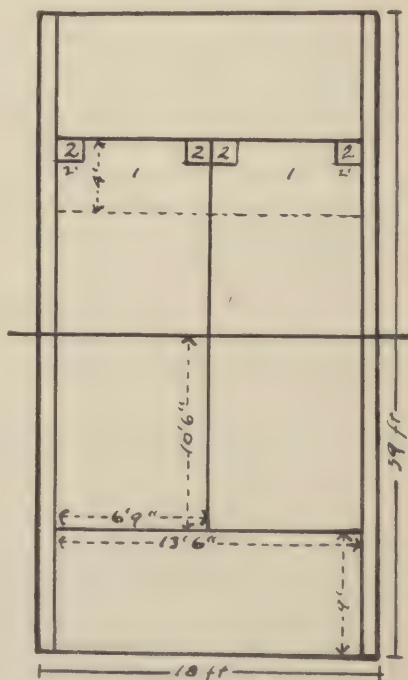
Scoring Scale

Raw Score	Scale Score
50-57	5
38-49	4
21-37	3
9-20	2
1-8	1

2. Service

a. *Set-up of equipment.* Regulation Paddle Tennis Court. Paddles. Balls. Four feet from the service line and parallel to it, draw a line across the court. (See Diagram 25.) Adjacent to the outer boundary of each service court, and on

DIAGRAM 25



each side of the half court line, and adjacent to the service line, draw four two-foot squares (see Diagram 25).

- b. *Description of the test.* Serving first from the right court and then from the left, take 10 trials (5 from each court) to serve the ball into the outlined scoring area. (See diagram.) Alternately serve to the outside and inside squares in each court.

- c. *Score.* Two points for each successful serve into the proper two foot square and one point for each serve which lands within the marked area at the back of the fore court.

Scoring Scale

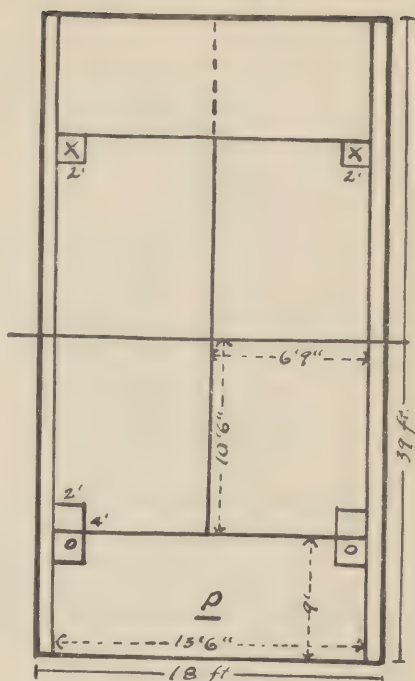
Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Taking Position on the Court

- a. *Set-up of equipment.* Mark two two-foot squares, one on either side of the court, adjacent to the alley and adjacent to the service line. Mark two other areas in the opposite court and adjacent to each alley, each of which is 2 x 4 feet, and centered on the service line between the service courts to the base line. (See Diagram 26.) Extend the dividing line between the service court on the base line.

- b. *Description of the test.* Player stands on line (P) in the center of the back court. A thoroughly capable assistant stands with the ball in the area marked (x). The ball is thrown directly across the net so that it lands within the 2 x 4 foot area marked (o). As the ball is thrown the player runs in to position to hit the ball back across the net, placing it first to the right and on the next trial to the

DIAGRAM 26



left of the center of the court. Five trials are taken when the ball is thrown into the area adjacent to the alley on the right side of the court and five are taken from the left.

- c. *Score.* Two points if the ball is hit so that it lands within the area of the proper court and its extension to the base line (right or left half, and within boundary), and one point if the ball is returned across the net and within the court, but which does not go into the proper right or left area.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

ROLLER SKATING

The Test:

1. Demonstrate skating straight forward at full speed and stopping.
2. Demonstrate skating straight forward, turning, and skating in opposite direction.
3. Demonstrate skating backward, turning, and skating forward.
4. Do a figure eight, starting to the right with the right foot forward.
5. Do a figure eight, starting to the right with left foot forward.
6. Do a one-foot standing balance from forward skating.
7. Do a one-foot standing balance from backward skating.
8. Do a one-foot squat balance from forward skating.
9. Do a dodge through indian clubs diagonally set 4 feet apart on the short axis (side to side) and eight feet apart on the long axis. The

run is thirty-six feet. It is timed from the signal "go," until the student passes the last indian club. The run should not exceed 30 seconds. (See Diagram 31, page 59, for illustration as to how the clubs are to be set.)

10. Do a dodge, as above, but with a turn, so that the first club is encircled skating forward, and the second club is encircled skating backward.

Score. Two points if correctly done on the first trial, one if done on the second.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

SHUFFLEBOARD

1. Accurate Placing

- a. *Set-up of equipment.* Lay out the shuffleboard court as indicated by the regulation rules. Either American or English form may be used.
- b. *Description of the test.* Following regulation shuffleboard rules, player pushes disk into the scoring area in an attempt to make as high a score as possible. Ten trials are allowed. The disk must be removed from the scoring area after each trial. Disks resting on a division line do not score. Disks that stop nearer to the players' end than the farthest dead line are dead and shall be removed at once.
- c. *Score.* Player scores according to the score value of the area in which the disk rests. Disks resting on a division line do not score.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
90-100	5
70-89	4
40-69	3
19-39	2
1-18	1

2. Accuracy in Displacing

- a. *Set-up of equipment.* Regulation shuffleboard court. Either English or American form may be used. Circle the plus 10, the 8 and the 7 score areas, and place a disk in each of these areas.
- b. *Description of the test.* Player attempts to displace the disks placed in the various scoring areas (10, 8, 7) forcing each to go out of the playing area. Two trials to displace the disk are allowed.

- c. *Score.* Each disk displaced scores five points. If the disk is touched and not displaced it scores three points. If the pushed disk lands in the correct area it scores one point.

Scoring Scale		
Raw Score	Scale	Score
25-30		5
19-24		4
10-18		3
5-9		2
1-4		1

SKIING

Demonstrate Ability to:

1. One step
2. Kick turn
3. Herringbone
4. Side step
5. Double stem (snow plow)
6. Single stem
7. Controlled fall and get up
8. Double stem turn
9. Single stem turn
10. Good form in down hill run
11. Lifted stem turn
12. Stem christy
13. Open christy
14. Obstacle Jump (Gelaendesprung)
15. Telemark

16. Pure christy
17. Tempo
18. Jump turn
19. Down hill run*
20. Slalom

Score. One point for each item successfully executed in good form.

Scoring Scale		
Raw Score	Scale	Score
17-20		5
13-16		4
7-12		3
4-6		2
1-3		1

SNOW SHOEING

1. Following Set Tracks

- a. *Set-up of equipment.* Snowshoes.
- b. *Description of the test.* Follow 12 set tracks of snowshoe imprints. Set tracks so that imprints measure 35 inches from toe of backward foot to toe of forward foot.
- c. *Score.* Two points if correctly done on the first trial, one if correctly done on the second.

2. Level Run

- a. *Set-up of equipment.* Snowshoes.
- b. *Description of the test.* Run along level ground making at least 15 imprints. Steps should be even distance apart, and not less than 33 inches from toe to toe.
- c. *Score.* Two points if correctly done on the first trial, one if correctly done on the second.

3. Uphill Run

- a. *Set-up of equipment.* Snowshoes.
- b. *Description of the test.* Run uphill on a slight incline. Tracks should be even distance apart. Balance should be maintained throughout the run.
- c. *Score.* Two points if correctly done on the first trial, one if correctly done on the second.

4. Downhill Run

- a. *Set-up of equipment.* Snowshoes.
- b. *Description of the test.* Run downhill on a slight incline. Tracks should be even distance apart. Balance should be maintained throughout the run.
- c. *Score.* Two points if correctly done on the first trial, one if correctly done on the second.

*N.B. Good form and successful execution in downhill run including obstacle jump (minimum one foot height).

5. Timed Run

- Set-up of equipment.* Snowshoes, and at least 22 poles or stakes.
- Description of the test.* Do a timed run over a course marked out by two sets of poles set not more than $3\frac{1}{2}$ feet apart. The course should include 30 feet downhill (slight incline), 50 feet on level ground (not necessarily smooth), and 30 feet uphill (slight incline). Student should maintain balance throughout, and should keep on the track, that is,

between the poles which mark it out. Time should not exceed one minute 20 seconds.

- Score.* Two points if correctly done on the first trial, one if correctly done on the second.

Scoring Scale

Raw Score	Scale Score
9-10	5
7-8	4
5-6	3
3-4	2
1-2	1

TABLE TENNIS

1. Repeated Volleys

- Set-up of equipment.* Regulation Table Tennis Table. Paddle. Ball. Turn the table and push it side-wise up against the wall. Stop watch.
- Description of the test.* Using regulation rules for doing so, player puts the ball in play as for the service in such a way that it hits the table and bounces against the wall above the net line. Volley the ball as it rebounds from the wall and continue to do so for a period of 30 seconds. If the ball is missed or otherwise lost take another ball and start as in the beginning. Penalty is in loss of time.

- Score.* Number of times the ball is hit so that it goes above the net line and rebounds on the table within the 30 second period of time.

Scoring Scale

Raw Score	Scale Score
51-55	5
41-50	4
16-40	3
6-15	2
1-5	1

2. Serve

- Set-up of equipment.* Regulation Table Tennis Table. Divide the receiver's court lengthwise into

four equal parts (See Diagram 27.) Paddle. Ball.

DIAGRAM 27



- Description of the test.* Make a legal serve, successively into each marked area, beginning with the area on the player's left. A total of 10 trials are allowed.
- Score.* Two points if a legal serve goes over the net and into the proper area, and one if the ball goes over the net and lands on the table but not in the proper area.

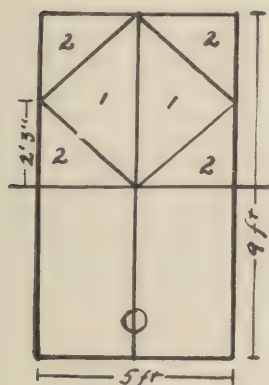
Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Accuracy of Volley

- a. *Set-up of equipment.* Regulation Table Tennis Table. Paddle. Balls. Divide the receiving court into four areas. A line is drawn from the middle of the base diagonally to a point on the side of the table midway between the base line and the net. Do the same for all four corners of the receiving

DIAGRAM 28



court. Draw a circle six inches in diameter, the center of which is a foot from the edge of the table. (See Diagram 28.)

- b. *Description of the test.* Ten trials are allowed the player to bounce the ball in the circle on her side of the net, and to hit it successively into each of the areas marked 2, beginning with the one on the left which is just over the net.
- c. *Score.* Two points if the ball is hit into the proper area marked 2, score one, if the ball goes over the net and lands on the table, but not within the proper area. Score values are indicated on Diagram 28.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

TENNIS

1. Rally Test

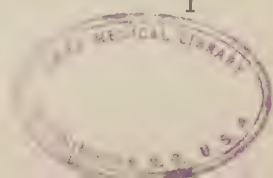
- a. *Set-up of equipment.* Backboard with line drawn three feet from and parallel to the ground to represent the net. Stop watch. Player should have two balls in hand and her racquet. Place a box of extra balls on the ground within easy reach of the player. Draw a restraining line 30 feet from, and parallel to the base of the backboard. This is also the starting line.
- b. *Description of the test.* The ball is rallied against the wall for a 60 second period. It must hit the wall on or above the net line. On signal the ball is dropped on the 30 foot line and put in play against the wall. The ball may bounce as many times as needed before hitting it, or it may be hit before it bounces. Any stroke or combination of strokes may be used. After

putting the ball in play the player may move around the court at will; and the player may cross the restraining line to retrieve balls or to play them, though *no balls* so hit may be counted in the score. Any number of balls may be used, and if any are lost do not try to retrieve them—take another ball from the box and put it in play as at the start.

- c. *Score.* Each ball striking the wall on or above the net line, and hit from behind the 20 foot line scores 1 point. Final score on the test is the sum of the score on three trials.

Scoring Scale

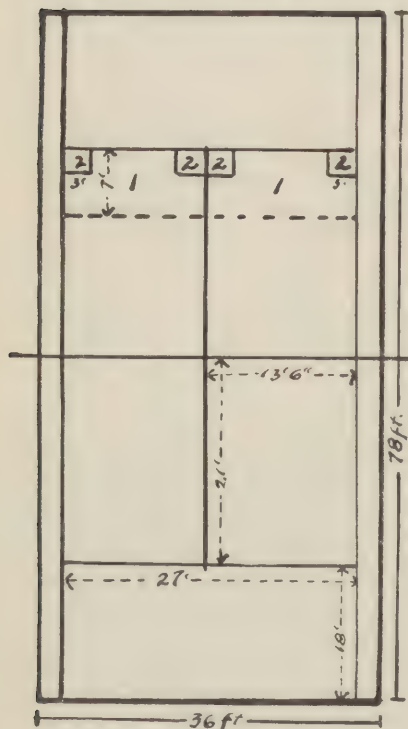
Raw Score	Scale Score
35-40	5
27-34	4
15-26	3
7-14	2
1-6	1



2. Service

- a. *Set-up of equipment.* Regulation tennis court. Racquet. Ball. Seven feet from the service line and parallel to it, draw a line across the court. (See Diagram 29.) Adjacent to the outer boundary of each service court, and on each side of the half court line, and adjacent to the service line, draw four three foot squares. (See Diagram 29.)

DIAGRAM 29



- b. *Description of the test.* Serving first from the right court and then from the left, take 10 trials (alternating right and left on each two trials as in regulation lawn tennis rules) to serve the ball into the outlined scoring area. Alternately serve to the outside and inside squares in each court.
- c. *Score.* Two points for each successful serve into the proper 3 foot squares and one point for each serve which lands within the

marked area at the back of the
fore court.

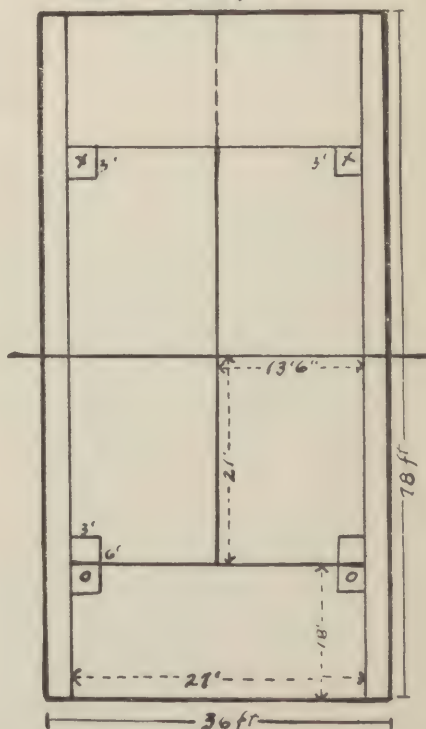
Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Taking Position on the Court

- a. *Set-up of equipment.* Regulation tennis court. Racquet. Balls. Mark two three foot squares, one on either side of the court adjacent to the alley, and adjacent to the service line. Mark two other areas in the opposite court and adjacent to each alley, each of which is 3 x 6 feet and centered on the service line. (See Diagram 30.) Extend the dividing line between the service courts to the base line.

DIAGRAM 30



- b. *Description of the test.* Player stands on the line (P) in the cen-

ter of the back court. A thoroughly capable assistant stands with the ball in the area marked (x). The ball is thrown directly across the net so that it lands within the area marked (o). As the ball is thrown the player runs in to position to hit the ball back across the net, placing it first to the right and on the next trial to the left of the center of the court. Five trials are taken when the ball is thrown into the area adjacent to the alley on the right side of the court and five are taken from

the left.

- c. *Score.* Two points if the ball is hit so that it lands within the area of the proper service court and its extension to the base line and one point if the ball is returned across the net within the court but which does not go into the proper area.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

TOBOGGANING

1. Proper Seating and Push Off

- Set-up of equipment.* Toboggan and slide in good condition.
- Description of the test.* Demonstrate proper seating, way to push off and steer by telling the instructor.
- Score.* Two trials are allowed. Score 2 points if correctly done on the first trial; score one if correctly done on the second.

2. Straight Downhill Run of 300 Feet

- Set-up of equipment.* Toboggan and slide in good condition.
- Description of the test.* Demonstrate practical use of this knowledge by taking the toboggan safely down a straight slope alone, and over a course of at least 300 feet.
- Score.* Two trials are allowed. Score 2 points if correctly done on the first trial; score one if correctly done on the second.

3. Downhill Run With Turns

- Set-up of equipment.* Toboggan and slide in good condition.
- Description of the test.* Demonstrate ability to safely control a toboggan alone on a course 300 feet long which includes two turns with approximately 30 degree angle once left and once right.
- Score.* Two trials are allowed. Score 2 points if correctly done on the first trial; score one if correctly done on the second.

4. Downhill Run With Four on the Toboggan

- Set-up of equipment.* Toboggan and slide in good condition.
- Description of the test.* Demonstrate ability to seat a group of four, give instructions for a safe slide, and then take them safely down a straight slope over a course of at least 300 feet.
- Score.* Two trials are allowed. Score 2 points if correctly done on the first trial; score one if correctly done on the second.

5. Downhill Run Making Turns With Loaded Toboggan

- Set-up of equipment.* Toboggan and slide in good condition.
- Description of the test.* Repeat (4) above, and in addition safely negotiate two turns with approximately a 30 degree angle—once left and once right.
- Score.* Two trials are allowed. Score 2 points if correctly done on the first trial; score one if correctly done on the second.

Scoring Scale

Raw Score	Scale Score
9-10	5
7-8	4
5-6	3
3-4	2
1-2	1

DANCE AREA

The dance area is divided into four sections: folk dance, modern dance, social dance, and tap dance. Sections of the dance area are different in make-up but the same kind of scoring scale has been fitted to each section for purposes of certification. Explanation of the way in

which each aspect of the dance area is scored accompanies explanation of the test elements.

To determine the meaning of the score in relation to certification, or to determine the meaning of one's own score, refer to Table I (page 9).

FOLK DANCE

Two points may be granted for each authentic dance learned and creditably performed either in class, or laboratory session. If it is done at an assembly or a folk festival, an additional point may be granted.

1. American dances such as quadrilles, rounds, squares, American Indian, etc.
2. Dances of other peoples such as English Country dances, Morris, Irish,

Scottish, Middle European, Scandinavian, Mexican, South American, Asiatic, etc.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

MODERN DANCE

One point may be granted for each of the following creditably performed in class or laboratory session. If done at an assembly, demonstration or school entertainment, an additional point may be granted.

1. Demonstrate the types of movement—swinging, including fall and recovery, breath and suspension, percussive, sustained and oppositional (natural oppositional for balance or non-oppositional for design of movement or meaning).
2. Demonstrate movement (locomotor) through space; such as walking, running, leaping, skipping, sliding, galloping, jumping, hopping, and traditional combinations.
3. Demonstrate movement (axial) in space; such as pushing, pulling, lifting, dodging, kicking, striking, pendulum swing of the body sideward, etc., rhythmically at various levels (prone, sitting, knee standing, standing, and in the air).
4. Demonstrate the turn in or through

space, taking off and landing on two feet, (thus you have done a jump).

5. Demonstrate a turn through space from one foot to the other. (This may be done with arm, leg, hips, or head lead).
6. Demonstrate a turn on one foot in space using suspension and an arm or leg lead.
7. Demonstrate a turn on one foot in space using suspension and a hip or head lead.
8. Demonstrate the ability to do foot patterns or movement in or through space in any appropriate time sequence or meter (should experience 2/4, 3/4, 4/4, 5/4, 6/8, 9/8, 12/8 if possible).
9. Demonstrate the ability to do a phrase of movement with a resultant or cumulative rhythm, changing meter, syncopation, or, twice as fast, twice as slow.
10. Perform a phrase of any number of movements showing the use of design of movement in space.

11. Perform a phrase of any number of movements showing the use of dimension (largeness or smallness) of movement.
12. Perform a phrase of any number of movements showing the use of fastness and slowness in meter.
13. Perform a phrase of any number of movements showing the use of strongness and lightness in intensity and dynamics.
14. Perform a rhythmic phrase of two types of movements using two or more levels which conveys an idea in any appropriate time sequence.
15. Perform a rhythmic phrase of two types of movements using 5 levels which conveys an idea in any appropriate time sequence.
16. Perform a rhythmic phrase of three types of movements using two or three levels which conveys an idea in any appropriate time sequence.
17. Perform a rhythmic phrase of three types of movements using 4 or 5 levels which conveys an idea in any appropriate time sequence.
18. Participate in the presentation of a dance composition.
19. Lead a group in the performance of an original dance composition.
20. Prepare the choreography and direct the performance of a dance composition.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

SOCIAL DANCE

Points are granted, as designated, for each of the following, if creditably performed in class or laboratory session. If done at an assembly, demonstration, or school entertainment, an additional point may be granted.

1. Walk forward and backward in time to 2/4, 3/4, 4/4 music (must do all these). 6 pts.
2. Demonstrate the ability to follow in 2/4, 3/4, and 4/4 music (must do all these). 6
3. Demonstrate the ability to waltz. 2

4. Demonstrate the ability to fox trot. 2 pts.
5. Demonstrate the ability to rhumba or samba or tango. 2
6. Demonstrate a currently popular dance step. 2

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

TAP DANCE

Two points may be granted for each of the following creditably performed in class or laboratory session. If done at an assembly, demonstration or school entertainment, an additional point may be granted.

1. Demonstrate the ability to do foot patterns of one and two sounds to 2/4, 3/4, 4/4, and 6/8 music as applied to a routine.

2. Demonstrate the ability to do a 3 or a 7 sound foot pattern to appropriate time signatures as applied in a routine. (It is suggested that a teacher devise a combination of appropriate sound patterns to simple songs or rounds.)
3. Demonstrate a 5.
4. Perform a waltz routine of at least 4 steps of 8 measures each.

5. Perform a buck routine of at least 4 steps of 8 measures each.
6. Perform a soft shoe routine of at least 4 steps of 8 measures each.
7. Perform a tap routine of at least 4 steps of 8 measures each. This may be a military jig, or eccentric tap.
8. Make a continuation of sound patterns to 8 measures.
9. To the above, add a different combination of 8 measures.
10. Compose a full routine of 32 measures.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1



SELF TESTING AREA

The activities of this area are: stunts and tumbling, apparatus, and emergency skills. Stunts and tumbling include both individual and couple types of activities. The apparatus section includes the horse, parallel bars, and stall bars. The emergency skills section includes some of those types of activities which have to do with handling the body efficiently and safely in experiences of everyday living.

Provision is made for scoring these activities on a twenty point basis, and for

interpreting the scores on a point scale of five.

In each group of activities in this area selection of the specific activity to be done is to be based upon a careful consideration of the facilities available and the local ruling in regard to these activities.

To determine the meaning of one score in relation to certification or to determine the meaning of one's own score, refer to Table I (page 9).

STUNTS AND TUMBLING

1. Stunts:*

Directions: Select 10 items from the following list. At least 6 of the 10 shall be the individual type of stunts.

a. Individual Stunts

1. Corkscrew (H. p. 31)
2. Cricket Walk (H. p. 49)
3. Duck Walk (H. p. 42, C. p. 199)
4. Human Ball (P. & B. p. 94)
Roly Poly (CC. p. 43)
5. Jump the Stick (S. p. 145,
P. & B. p. 106)
6. Knee Dip (H. p. 31; P. & B.
p. 96)
7. Nose Dive (H. p. 34)
8. Seal Slap (S. p. 141)
9. Tip Up (P. & B. p. 100, C. p.
183, H. p. 67)
10. Toe Jump (P. & B. p. 111)
11. Through the Stick (H. p. 35,
P. & B. p. 98)
12. The Top (P. & B. p. 100, C. p.
183, H. 67)

b. Couple Stunts

13. Angel Balance (H. p. 132, C.
p. 191)
14. Camel Walk (P. & B. p. 121)
15. Elephant Walk (P. & B. p.
120)
16. Flying Swan (C. p. 206)

17. Hand Support at Hips (H. p.
129)

18. Hobby Horse (S. p. 141)

19. Stand on Partner's Knee (H.
p. 128)

- c. *Score:* Two trials may be allowed to do each stunt. Score two points for each stunt passed on the first trial and one if passed on the second.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

2. Tumbling*

Directions: Select 10 items from the following list. At least 6 of the 10 shall be individual in type of tumbling activity.

a. Individual Type

1. Backward roll (C. p. 157, H.
p. 55)
2. Backward roll to head stand
(H. p. 93)
3. Forearm stand (C. p. 189, H.
p. 78)
4. Forward roll (C. p. 151, P. &
B. p. 93)
5. Hand stand (C. p. 189, H. p.
75)

*Note: Letters in parentheses which follow the name of each activity indicate the source where description of it can be found. See Bibliography, p. 60.

6. Hand stand to a forward roll (C. p. 90)
7. Head stand (C. p. 183, H. p. 68)
8. Partner hand stand (C. p. 210)
9. Snap up (H. p. 82)
- b. *Couple Type*
 10. Assisted somersault over knees (L & R p. 78)
 11. Dive over one (C. p. 175, H. p. 59)
 12. Dive over two (C. p. 175, H. p. 59)
 13. Dive over three (C. p. 175, H. p. 59)
 14. Double backward roll (C. p. 164)
 15. Double forward roll (C. p. 163)
 16. Hand stand over back (C. p. 211)
 17. Mercury (H. p. 135)
 18. Shoulder stand on base's feet (H. p. 146)
 19. Sitting mount (H. p. 136)
 20. Sitting mount to thigh balance (H. p. 149)
 21. Standing mount (H. p. 136)
 22. Table or box balance (H. p. 137)
- c. *Score*: Two trials may be allowed to do each activity. Score two points for each stunt passed on the first trial, and one if passed on the second trial.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

APPARATUS

1. Horse*

(Activities are listed according to difficulty.)

a. *Directions*: Select 10 items from the following list. The 10 items selected constitute the test.

1. Controlled landing: vault the horse, land on the balls of the feet, letting knees and ankles give immediately to absorb the shock.
2. Knee mount (M & H)
3. Standing mount (M & H)
4. Squat vault (M & H)
5. Forward rest to forward roll
6. Dive over—attain a forward rest position, from a jump, without putting hands on the horse. Reach for floor on the opposite side and roll over.
7. Flank vault to right (M & H)
8. Flank vault to left (M & H)
9. Wolf vault right (Z, T)
10. Wolf vault left (Z, T)
11. Courage vault (S)

12. Backward mount to backward roll—mount to a backward position on horse. Lean back with a grasp on the pommels, lift legs over head and drop with feet on floor in a standing position.
13. Cross seat to riding seat (M & H)
14. Cross seat between pommels to right (M & H)
15. Half squat; half straddle vault to right (M & H)
16. Half squat; half straddle vault to left (M & H)
17. Full straddle vault (M & H)
18. Oblique vault from the right (M & H)
19. Oblique vault from the left (M & H)
20. Climb over horse at height of seven feet.

b. *Score*: Two trials may be allowed to do each activity. Score two points for each one passed on the first trial, and one if passed on the second.

* Letters in parentheses which follow the name of each activity indicate the source where a description of it can be found. See Bibliography, p. 60.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

2. Parallel Bars*

(Activities are listed according to difficulty.)

- a. *Directions:* Select 10 items from the following list. The 10 items selected constitutes the test.

Low Bars

1. Forward swing with end dismount (M & H)
2. Riding mount and dismount (M & H)
3. Riding seat traveling forward and backward (M & H)
4. Backward vault to right (M & H)
5. Backward vault to left (M & H)
6. Skin the cat
7. Tip up to inverted hang (M & H)
8. Back arch—standing in center, between the two bars, squat and raise arms high. Grasp with one hand on each bar, palms of the hands turned toward each other. Lift both knees to chest and cross one knee over each bar in front of hands. Catch toes in bars, release hand grip, lower body to floor, walk along floor with hands, and with a contraction of back muscles place hands on bars beyond feet. Release leg grip and slowly lower the feet to floor.
9. Face vault to right.
10. Face vault to left.

High Bars

11. Hang to support body weight for five seconds, one hand on each bar

12. Hang and travel with a swing (M & H)
13. Hang and travel without a swing (M & H)
14. Shoulder stand (Z, T)
15. Hang by knees and swing—Hook knees over nearest bar, catch toes under opposite bar, release hand grip and swing.
16. Horizontal sit to backward hang—Sit on bar with back to outside. Use reverse hand grip. Swing legs overhead and hang by arms. Drop to standing position on floor.
17. Front lying to roll over—Lie across both bars, grasp bar by head with reverse grip. Raise hips and swing legs overhead and down to standing position on floor.
18. Travelling sideward with a swing (M & H)
19. Travelling sideward without a swing (M & H)
20. Travelling sideward with a turn—Start with ordinary grasp on one bar (as on horizontal bar), swing, release left hand grasp while twisting body toward the right, and grasp again in a combined grasp with left hand more advanced than the right. Repeat releasing right hand and twisting toward the left.

- b. *Score:* Two trials may be allowed to do each activity. Score two points for each one passed on the first trial and one if passed on the second.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

3. Stall Bars

(Activities are listed according to difficulty.)

* Letters in parentheses which follow the name of each activity indicate the source where a description of it can be found. See Bibliography, p. 60.

a. *Directions:* Select 10 items from the following list. The 10 items selected constitute the test.

1. Demonstrate a long (passive) hang (15 seconds) starting count when feet are off the rung.
2. Climb bars and sit on top bar for 5 seconds.
3. In a long hang position raise both knees to a position waist high, or higher, and hold for 5 seconds.
4. In a long hang position raise both legs, knees straight, to a position waist high, or higher, and hold for 3 seconds.
5. Sit facing stall bars, feet hooked under second rung, reach forward and grasp second rung with hands and *hold*.
6. From a back lying position, arms extended overhead, feet hooked under second rung (stretch lying, make a quick reach to grasp the second bar with the hands, climb rhythmically for 12 consecutive rungs lifting body off floor, and return in reverse order, controlling body weight. Knees must remain straight at all times.
7. Back lying, hands grasping second rung, quickly lift the legs to hook the feet on the second bar. With the toes climb to straight position. Descend, hook toes under bars to the fifth rung. From there on with both toes under each rung stretch legs to a knee straight position.
8. Starting from hanging with

an arm bent position, lower the body slowly to a straight hang position.

9. From a long hang (passive) lift legs knees straight, snap into an arched back position, releasing the hands at same time and landing on a mat as far away as possible.
 10. Monkey leap. Feet on bottom rung, hands on rung approximately shoulder level, alternately bend, spring to next section, catching next higher bar. Continue to next bar or return to the first.
 11. Do a front hang. Swing body travelling sideward.
 12. Do a back hang. Swing body travelling sideward.
 13. Do an inverted hang.
 14. Side to bar, outward extension of arms and legs.
 15. Span bending without assistance. (Span bending: stand two feet from, and back to the stall bars. Reach back and down to grasp the bars as low as possible. Raise the chest as high as possible. Keep the toes in contact with the floor).
- b. *Score:* Two trials may be allowed to do each activity. Score two points for each one passed on the first trial, and one if passed on the second.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

EMERGENCY SKILLS

a. *Directions:* Select 10 items from the following list. The 10 items selected constitute the test.

1. Balance walk (2 inch beam or chalk line)—Walk 12 feet.
2. Balance walk—Walk 12 feet carrying 5 lb. weight on one hip.

3. Balance walk—Walk 12 feet carrying 5 lb. weight in arms in front of body.
4. Balance—with hands on hips walk across a balance beam or board 12 feet long (and not more than 2 inches wide) raising alternate knees to right

angle with the body. Turn on the balance beam and return in the same manner.

5. Landing—jump from a height of not less than 4 feet, or drop from support with the feet not less than 4 feet from the floor, maintaining control and good balance in landing.
6. Suspension Travel—progress at least 12 feet, hand over hand, along an overhead ladder, parallel bars, or other support, keeping the feet together and the knees straight.
7. Running and Falling—standing on starting line, fall to floor (use a side fall), regain feet, and run across a line 40 feet away. Time must not exceed 6 seconds.
8. Ladder Climb Carrying Weight—carrying a 10 lb. weight (preferably a sand bag on thigh or shoulder), climb a ladder, using appropriate

and, using thigh to boost, place the weight on a table.

10. Crawling—Crawl through a tunnel 10 feet long and 15 inches high.

(NOTE: Tunnel may be constructed by rolling mats; by placing mats over stall bar benches, etc.)

11. Climbing Over Obstacle—climb over an obstacle not less than 5 feet high and not less than 12 inches wide, maintaining control and balance in landing on the far side.
12. Dodging—run 36 feet and return, dodging obstacles diagonally set 4 feet apart on the short axis (side to side) and 8 feet apart on the long axis. (See Diagram 31.) Run must be traversed in not more than 15 seconds.
13. Vault over object (plinth, horse or other improvised object at least hip high).

DIAGRAM 31



climbing technique, until feet are at least eight feet above the ground. Descend the ladder to ground.

9. Lifting and Carrying—using proper lifting technique, lift from the floor a 25 lb. weight (preferably a sand bag in a box), and using the thigh, transport the weight 30 feet

14. Fall—demonstrate (a) Forward fall; (b) Sideward fall; (c) Backward fall.

15. Rope Climb—climb 12 feet and descend hand over hand.

- b. Score: Two trials may be allowed to do each activity. Score two points for each one passed on the first trial, and one if passed on the second.

Scoring Scale

Raw Score	Scale Score
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

BIBLIOGRAPHY:

- (C) Cotteral, B. & D., *The Teaching of Stunts & Tumbling*.
 A. S. Barnes & Co., New York City, 1936.
 (CC) Cotteral B. & D., *Tumbling, Pyramid Building & Stunts for Girls and Women*.

- A. S. Barnes & Co., New York City, (1926)
 (H) Horne, Virginia L., *Stunts and Tumbling for Girls*.
 A. S. Barnes & Co., New York City, 1943
 (L & R) LaPorte, W. R. & Renner, A. G., *The Tumbler's Manual*.
 Prentice Hall, Inc., New York City, 1938
 (M & H) Moss crop, A. and Hardenbergh, H., *Descriptive Analysis of Selected Apparatus Events for Girls & Women*.
 Burgess Publishing Co., Minneapolis, Minn, 1931.
 (P & B) Pearl, N. H. and Brown, H. E., *Health by Stunts*. The Macmillan Co., New York City, 1932.
 (S) University of the State of New York, *Physical Education Syllabus*, Book III, Secondary School Girls 1934.
 (T) McCulloch, J. H., *Gymnastics, Tumbling, Pyramids*.
 W. B. Saunders Co., Philadelphia, Pa. (1934).
 (Z) Zwarg, Leopold F., *Apparatus and Tumbling Activities*, McVey, J. J., Philadelphia, Pa., 1928.

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AQUATICS AREA

The several batteries of tests in this area follow their own unique pattern. The swimming test contains three batteries of tests — self-safety, rescue skills, and strokes, calibrated to the merit, excellent, and superior levels. The boating and canoeing tests are check lists of items to be demonstrated and scored on a 20 point scale.

With the exception of the merit level of the self-safety swimming test the teacher may follow her own best judgment

in the order in which the three batteries of tests are taken. *All* items in any swimming battery at a specific level must be passed.

In the case of boating and canoeing, items must be checked in order (1 to 20). To qualify on the merit level in each of these activities, items 1 through 12 must be passed. To qualify on the excellent level items 1 through 16 must be passed, and on the superior level items 1 through 20. (See Table I, page 9.)

SWIMMING

1. Self-Safety Tests

A. Merit Test

- a. *Directions:* Demonstrate ability to perform all eight items as designated in the "standard of performance" column.

<i>Item:</i>	<i>Standard of Performance:</i>
1. Floating	1 minute
2. Treading	1 minute
3. Endurance swim	5 minute continuous swim, 100 yards of which must be one stroke. Choice of breast, side, or crawl stroke.
4. Sculling	10 yards
5. Elementary back stroke	50 yards
6. Water entry (deep water)	2—(1 feet first (hold nose) (1 standing front
7. Turns	1—Choice of type
8. Under water swim	10 feet

- b. *Score:* Allow one point for each item. A total of eight points required.

B. Excellent Test

- a. *Directions:* Demonstrate ability to perform all six items as designated in the "standard of performance" column.

<i>Item:</i>	<i>Standard of Performance:</i>
1. Floating	3 minutes
2. Treading	3 minutes
3. Endurance swim	10 minutes continuous swim
4. Water entry (deep water)	2 (1 standing front (1 running front
5. Turns	2 (1 front turn (1 back turn
6. Under water swim	Surface dive (minimum of 3 feet in depth) and swim 20 feet

- b. *Score:* Allow one point for each item. A total of six points required.

C. Superior Test

- a. *Directions:* Demonstrate ability to perform all six items as designated in the "standard of performance" column.

<i>Item:</i>	<i>Standard of Performance:</i>
1. Floating	5 minutes—dressed (shirt, slacks, sneakers)
2. Treading	5 minutes—dressed (shirt, slacks, sneakers)
3. Endurance swim	One half mile continuous swim, combination or choice of strokes allowed
4. Water entry (deep water)	3 (racing start (back dive (front—pike or swan
5. Turns	3 (front (back (side
6. Under water swim	Surface dive and swim 30 feet

- b. *Score:* Allow one point for each item. A total of six points required.

2. Rescue Skills

A. Merit Test

- a. *Directions:* Demonstrate ability to perform both items as designated in the "standard of performance" column.

<i>Item:</i>	<i>Standard of Performance:</i>
1. Resuscitation	Minimum of 2 minutes in good form
	a. Arm and leg reaches
	b. Extension reaches with a pole, board or towel
	c. Extension reaches—throw a line or buoy
2. Simple rescue assists	

- b. *Score:* Allow one point for each item. A total of two points required.

B. Excellent Test

- a. *Directions:* Demonstrate ability to perform the four items as designated in the "standard of performance" column.

<i>Item:</i>	<i>Standard of Performance:</i>
1. Resuscitation	Complete items under each heading as presented in American Red Cross Junior Life Saving Standards.
2. Approaches	
3. Carries	
4. Releases	

- b. *Score:* Allow one point for each item. A total of four points required.

C. Superior Test

- a. *Directions:* Demonstrate ability to perform the four items as designated in the "standard of performance" column.

<i>Item:</i>	<i>Standard of Performance:</i>
1. Resuscitation	Complete items under each heading as presented in American Red Cross Senior Life Saving Standards.
2. Approaches	
3. Carries	
4. Releases	

- b. *Score:* Allow one point for each item. A total of four points required.

3. Swimming Stroke Tests

A. Merit Test

- a. *Directions:* Demonstrate ability to perform all three items as designated in the "standard of performance" column. Judge form of each stroke on a five factor basis, i.e., position, arm action, leg action, breathing, and coordination.

Item:

1. Elementary back stroke
2. Side stroke
3. Breast stroke

Standard of Performance:

- Form
Form
Form

- b. *Score:* Allow one point for each item. A total of three points required.

B. Excellent Test

- a. *Directions:* Demonstrate ability to perform all three items as designated in the "standard of performance" column. Judge strokes requiring form rating on a five factor basis, i.e., position, arm action, leg action, breathing and coordination.

Item:

1. Breast stroke
2. Crawl stroke
3. Back crawl stroke

Standard of Performance:

- 50 feet in no more than 27 seconds
Form
Form

- b. *Score:* Allow one point for each item. A total of three points required.

C. Superior Test

- a. *Directions:* Demonstrate ability to perform each item as designated in the "standard of performance" column.

Item:

1. Breast stroke
2. Crawl stroke
3. Back crawl stroke

Standard of Performance:

- 50 feet in not more than 24 seconds
50 feet in not more than 15 seconds
50 feet in not more than 21 seconds

- b. *Score:* Allow one point for each item. A total of three points required.

BOATING

Prerequisite to taking the boating test, and for reasons of safety: demonstrate the ability to swim in deep water as shown by passing the Self-Safety Swimming Test on the merit level—unless accompanied by a swimmer who holds at least the Senior Red Cross Life Saving Certificate.

- a. *Directions:* The following check list is the basis for certification in boating. One point is credited for each item satisfactorily performed.
1. Identify the following parts of a row-boat; bow, stern, keel, gunnels, oar locks. Demon-

strate the meaning of starboard and port.

2. Demonstrate the proper method of launching a boat.
3. Demonstrate the proper method of entering and leaving a boat, (a) from the dock or float, and (b) from the shore.
4. Demonstrate the proper method of pushing off from and of landing, (a) from and to dock or float, and (b) from and to beach or shore.

5. Demonstrate a straight-away stroke.
 6. Demonstrate a sculling stroke.
 7. Demonstrate a bow landing.
 8. Demonstrate a stern landing.
 9. Demonstrate a starboard landing.
 10. Demonstrate a port landing.
 11. Demonstrate a starboard turn.
 12. Demonstrate a port turn.
 13. Alone in a row boat, row a straight course for one-eighth of a mile, make a starboard turn, then a port turn, and return to the starting point.
 14. Demonstrate how to bail a boat.
 15. Jump out of a boat in deep water and get back in without shipping water.
 16. Demonstrate the proper method for changing seats in a boat.
 17. Show how to assist a person into a boat in deep water.
 18. Show method for handling a boat when only one oar is available.
 19. Show how to "trim" (adjust load) a boat.
 20. Tell what is necessary to equip a life boat.
- b. *Score:* Items are to be checked off in order 1-20. Score one point for each item checked.

Scoring Scale

<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

CANOEING*

Prerequisite to taking the canoeing test, and for reasons of safety: demonstrate the ability to swim in deep water as shown by passing the Self-Safety Swimming Test on the merit level—unless accompanied by a swimmer who holds at least the Senior Red Cross Life Saving Certificate.

a. *Directions:* The following check list is the basis for certification in canoeing. One point is credited for each item satisfactorily performed.

1. Demonstrate the proper method of launching a canoe.
2. Demonstrate the proper method of entering and leaving a canoe, (a) from the dock or float, and (b) from the shore.
3. Demonstrate the proper method of pushing off and of landing, (a) from and to dock or float, and (b) from the shore.
4. With a companion show proper form in paddling both bow and stern on both sides of canoe.

5. Demonstrate a bow stroke.
6. Demonstrate a backwater stroke.
7. Demonstrate a "J" stroke.
8. Demonstrate a sweep or "C" stroke.
9. Demonstrate a "push-over" stroke.
10. Demonstrate a draw stroke.
11. Demonstrate a bow-rudder stroke.
12. Demonstrate sculling stroke.
13. Demonstrate an underwater stroke.
14. Alone in a canoe without bal-last, paddle a straight course for an eighth of a mile, turn right about, then left about keeping paddle always on same side of canoe, change paddle to other side and return to starting point.
15. Demonstrate the technique for "shaking out" a canoe.
16. Jump out of canoe in deep water and get back in without shipping water.

*Note: for stroke descriptions see Claussen, Waldemar Van Brunt, *Canoeing*. Published by the Boy Scouts of America.

17. Show how to get into a water-filled canoe and bring it to shore.
 18. Demonstrate the proper method for changing seats in a canoe.
 19. Show how to assist a person into a canoe in deep water.
 20. Demonstrate a double canoe rescue.
- b. *Score:* Items are to be checked off

in order 1-20. Score one point for each item checked.

Scoring Scale	
<i>Raw Score</i>	<i>Scale Score</i>
17-20	5
13-16	4
7-12	3
4-6	2
1-3	1

OUTING AND CAMPING AREA

The outing and camping area includes fire making, outdoor cookery, trailing and trail making, nature study, and camping trips.

The complete battery is a check list of items to be demonstrated and scored "passed or failed."

Method of Certification

- a. As a prerequisite to certification on the merit level sections 1, 2, 3, and 5 (a) must be completed.
- b. To certify on the merit level do, in addition to the above, 4 and 5 (b, c, d, and e).
- c. To certify on the excellent level do, in addition to the above, 5 (f), 6, and 7.
- d. To certify on the superior level do, in addition to the above, 5 (g and h) and 8 (a, or b, or c, or d).

1. Preparation

- a. Demonstrate correct form in wood cutting and whittling (firewood, roasting forks, spits, and other camp implements).
- b. Demonstrate ability to clear a camp site.
- c. Demonstrate assembling packs and blanket rolls.
- d. Set up any style tent.
- e. Demonstrate knowledge of proper clothing for hikes and camping.
- f. Demonstrate knowledge of "rules of the road" including hiking etiquette, precautions regarding safe drinking water, proper behavior regarding trees, flowers, animals, etc.
- g. Demonstrate knowledge of proper sanitation in outdoor living.
- h. Demonstrate proper safety precautions and preparation for first aid in hiking and camping.
- i. Sketch plans for a temporary camp.

2. Firemaking

Demonstrate the ability to select proper wood and to lay and make

burn within 10 minutes one fire of each of the following types:

- a. Cooking fires (i.e., log cabin, broiling, trench, beanhole, barbecue, etc.).
- b. Sociability fires (i.e., pyramid, council, criss-cross, star).
- c. Warmth fires (i.e., back log, snow, all night, wind break).
- d. Miscellaneous fires (i.e., smudge, signal).

3. Outdoor Cookery

Prepare a type of food by one of the following methods:

- a. Over heat (hunter's stew, steak, bacon and eggs, flapjacks, shish kabob, etc.).
- b. Hole (baked beans, fish, etc.).
- c. Bake (biscuits, corn pone).
- d. Plan a complete outdoor meal.
- e. Plan 3 meals including breakfast, lunch, and dinner, suitable for use on a walking trip with 10 persons. (i.e., list food, list cooking utensils, and list eating utensils. Stress the importance of menus planned with a minimum of cooking dishes).

4. Trails

- a. Chart one hike for use in locality describing distance, preliminary transportation necessary, interest points en route, facilities at destination for drinking water, etc., and recreation offerings of selected point, etc.
- b. Mark a quarter-mile trail using one of the following types of signs: bent twig, Indian stone, or cross logs.

5. Hiking

Note to teacher: in the administration of this test, any of the following items may be combined with any other item preceding or following so that both may be graded simultaneously.

- a. Hike one mile during a laboratory period.

- b. Hike two miles during a laboratory period.
- c. Hike three miles planning so that the group remain out for at least one-half day (i.e., include picnics or instruction on any other item).
- d. Hike five miles planning so that the group remain out for at least one half day.
- e. Hike seven miles during a full day.
- f. Hike ten miles during a full day.
- g. Participate in an overnight hike.
- h. Participate in a hostel trip.

6. Hiking Administration

- a. Arrange groups for an actual hike (i.e., list names of those attending, arrange a meeting place, transportation, etc.).
- b. Make a check list of equipment necessary for a one-day hike.
- c. Make a check list of equipment necessary for an overnight hike.

- d. Plan a distribution and schedule of duties for an overnight group of at least 10 persons.

7. Nature Study

While on a hike identify:

- a. Five species of birds.
- b. Five species of hardwood trees.
- c. Five species of softwood trees.
- d. Be able to recognize three species of poisonous plants.
- e. Be able to locate the north star, the big dipper, the little dipper.

8. Other Types of Trips

- a. Bicycle (maximum points on bicycle test required).
- b. Pack trips on horseback (maximum points on riding test required).
- c. Ski trips (cross country). (Basic certificate required.)
- d. Snowshoe trip.

